# Author index

# A

Abraham, A.A. 31 Abrahamsson, H. 79 Acampora, R. 123 Addicks, K. 1157 Adzuma, K. 381 Agosti, K. 1313 Agostini, G. 739 Ahrén, B. 395 Åkerblom, H.K. 97, 705, 1042. Alberti, K. G. M. M. 699 Alcolado, J.C. 376, 1482 Alcolado, R. 1482 Aldington, S.J. 437 Alford, F. 326 Alzaid, A. 337 Amadio, L. 711 Amato, L. 1295 Amiel, S. A. 1412 Amoretti, R. 848 Andersen, H. 1191 Andersson, A. 543 Andersson, H. 79 Andreani, D. 848 Andrikopoulos, S. 1389 Anello, M. 55, 779 Anfossi, G. 936 Annuzzi, G. 1419 Aparicio, S. R. 1455 Arakawa, K. 1434 Araki, E. 422 Araki, S. 193 Archer, D.B. 1271 Ariano, D. 403 Arii, H. 792 Arner, P. 128 Aronica, R. 1076 Arrieta, F.J. 1262 Arslanoğlu, İ. 629 Asahi, Y. 1033 Asfari, M. 927 Asplund, K. 1061 Assan, R. 283 Assmann, K. J. M. 161, 1169 Atkinson, A.B. 853 Attvall, S. 79 Aunis, D. 180 Awata, T. 748

## B

Bachmann, S. 525
Baier, L.J. 461
Baird, J.D. 1055
Bakker, M.A.H. 161, 1169
Balaun, E. 122
Baldo, L. 1076
Ballhausen, T. 1157
Bangstad, H.-J. 1197, 1320
Barceló, J. 62
Barlow, S. W. 906
Barnes, P.R. J. 1205
Baroni, M.G. 848
Barrow, B.A. 693

Baum, H. 875 Baumgartner-Parzer, S. M. 1367 Bazzigaluppi, E. 816 Becker, D. J. 1090 Beck-Nielsen, H. 326 Bedford, C. 1183 Beech, J.S. 889 Beks, P.J. 86 Bell, G.I. 211, 1055, 1466, 1479 Bell, P.M. 853 BenDahan, D. 1485 Bender, R. 227 Bending, J. J. 252 Bendtzen, K. 153 Bennett, P.H. 187, 221, 1487 Benthem, L. 919 Berden, J. H. M. 124, 161, 1169 Berger, M. 227 Bergström, B. 1003 Berrish, T.S. 699 Bertrams, J. 351 Biessels, G.J. 251 Binder, A. 126 Bingley, P.J. 816 Biro, P.A. 752 Bishop, D.T. 221, 1487 Bjørbæk, C. 1230 Biörck, S. 216 Biørn, S. F. 1197 Björnsson, E. 79 Blanché, H. 378 Bloch, W. 1157 Blohmé, G. 216 Boari, L. 306 Boccuni, M. L. 848 Boden, G. 1307 Boel, E. 14 Boelskifte, S. 798 Boemi, M. 711 Bogardus, C. 461, 1213 Bognetti, E. 816 Boivin, S. 577 Bolli, G. 106 Bolli, G.B. 244 Bonadonna, R.C. 518 Bonifacio, E. 751, 816, 968 Bonora, E. 318, 672 Borboni, P. 445 Borch-Johnsen, K. 798 Born, J. van den 161, 1169 Boroujerdi, M. 1007 Bosi, E. 816, 968 Bottazzo, G. 126 Bottazzo, G.F. 816 Bottini, P. 244, 1003 Boucher, B.J. 1125, 1239 Bouix, O. 494 Boulton, A. J. M. 1051 Bouter, L.M. 86 Bouwens, L. 1405 Bowsher, R. 1328 Bozzetti, A.M. 306 Braghi, S. 816 Brambilla, P. 739

Bramnert, M. 1003

Brandenburg, D. 1007 Bravenboer, B. 251 Breimer, L. 630 Bressan, F. 318 Bretzel, R.G. 656 Brismar, K. 474 Brismar, T. 685 Brocker, U. 1397 Brownlee, M. 269, 656 Brun, J.F. 494 Brunetti, P. 244 Brunk, U. 635 Bruno, A. 1218 Bucci, M. G. 804 Bundak, R. 629 Buongiorno, A. 518 Burcelin, R. 283 Burden, A.C. 467 Buscema, M. 39, 779 Buysschaert, M. 253 Buzzetti, R. 126, 848 Byrne, C.D. 1358

## C

Cacciatori, V. 318 Cagliero, E. 785 Cajola, S. 518 Calori, G. 306 Caltabiano, V. 39, 779 Calvillan, M. 378 Cambien, F. 798 Cameron, N.E. 1285, 1475 Campagnola, M. 1122 Campea, L. 848 Canessa, M. 785 Carrasco et al.), E. 378 Carroll, C.A. 732 Casanova, B. 1262 Casetta, B. 1117 Casla, A. 1262 Cassone Faldetta, M. 848 Castellino, P. 732 Casucci, G. 244 Catinella, S. 1076 Caumo, A. 739 Cavallo, M.G. 848 Cavallo-Perin, P. 1218 Cavalot, F. 936 Cerasi, E. 992 Ceriello, A. 1484 Chaiken, R.L. 1307 Chakravarthy, U. 1271 Chandramouli, V. 831 Charles, M. A. 187 Chase, H.P. 1353 Chaturvedi, N. 630 Cheng, I.K.P. 604 Chiu, K. C. 1490 Chiumello, G. 739 Christopher, M. 326 Chuang, L.-M. 1490 Ciani, F. 672 Cicconetti, C.A. 848 Clark, A. 868

Clark, A. E. 661 Clark, S. 1131 Cobelli, C. 739 Cohen, A.M. 899 Cohen, N. 378 Cohen, P.T.W. 461 Cohen, R.D. 889 Colle, E. 715 Collins, P. 1300 Colucci, G.B. 573 Cominacini, L. 1122 Concannon, P. 1479 Cooper, M. 1493 Cooper, M.E. 387 Corbellini, M. 318 Cotter, M. A. 1285, 1475 Cox. N.J. 1479 Cozzone, P.J. 1485 Crémel, G. 180 Crellin, D.M. 1455 Crepaldi, G. 672 Crinò, A. 848 Cummings, M. H. 959 Cupisti, S. 227 Cushman, S.W. 661 Czernichow, P. 927

### D

Dahlquist, G. 874, 1371 D'Alfonso, R. 445 D'Amore, A. 1295 Danilov, S. 798 D'Autilia, M.L. 430 Davis, E.M. 1466 Davison, A.M. 1455 Davoli, A. 1122 Dawson, D. 454 Day, N. E. 1358 De Leiva, A. 633 De Marco, R. 318 De Maria, R. 953, 1449 De Mattia, G.C. 848 De Santis, A. 1122 De, W. 927 Deeb, S.S. 617 DeFronzo, R.A. 732 Degano, C. 779 Dekel, N. 753 Demaine, A. 1495 Demaine, A.G. 623 Demura, H. 792 Denver, A.E. 356 Denver, E. 454 D'Erme, M. 1117 Desai, N.G. 251 Desnuelle, C. 1485 Després, J.-P. 631 Dewhurst, M. 129 Dey, J. 251 Di Marino, L. 1419 Di Mario, U. 1117 Diderholm, H. 1371 Dijkman, H. B. P. M. 1169 Dimitriadis, E. 1300

## Dines

Dines, K.C. 1285 Dinneen, S. 337 Dionisi, S. 1117 Dissing, S. 1025 Djurup, R. 680 Dodds, R. A. 252 Dolitzki, M. 753 D'Onofrio, F. 1295 Donzella, C. 123 Doria, A. 785 Dorin, R.I. 46 Dorman, J. 378 Dotta, F. 1117 Dottorini, M. L. 244 Dudley, C. R. K. 948 Dukes, I.D. 877 Dunlop, M. 387, 1493 Dunlop, M.E. 298, 1131 Durola, L. 804 Dyrberg, T. 14

### E

Eastman, R. 672 Ebbli, E. 306 Ebner, K. 864 Eckel, J. 764 Eckert-Norton, M. 1307 Eddouks, M. 283 Eidemak, I. 565 Eisenbarth, G.S. 1117, 1353 Eizirik, D.L. 543 Ekberg, K. 831 Ekstrand, A.V. 363 Eliasson, B. 79 Elliott, R.B. 1130 Elving, L.D. 124 Ennis, C.N. 853 Eriksson, J. 344 Eriksson, J.G. 363 Eriksson, K.F. 1466 Esposito, L. 968 Evans, S. J. W. 889, 1239 Evgrafov, O.V. 749

# F

Fagrell, B. 474 Falorni, A. 1353 Farkas-Szallasi, T. 31 Fava, D. 848 Fédou, C. 494 Fedele, D. 1076 Federlin, K. 269, 656 Fedorak, R.N. 403 Fehm, H.L. 757 Feldman, B. 753 Feldt-Rasmussen, B. 565 Fennessy, M. 752 Fennessy, M.J. 1223 Fernández-Alvarez, J. 62 Ferrannini, E. 1 Ferrari, M. 968 Feskens, E.J.M. 839, 1096 Flyvbjerg, A. 135 Foley, J.E. 1213 Forsblom, C.M. 363 Forsgren, M. 1371 Fosang, A.J. 298

Fowelin, J. 79 Foyle, W.-J. 356, 454 Fraser, J.R.E. 298 Fratta Pasini, A. 1122 Freire, M.B. 1486 Friemann, J. 1397 Frisk, G. 1371 Frittitta, L. 55, 445 Froguel, P. 378 Frøkjær-Jensen, J. 1025 Fu, J. 503, 1249 Fujimoto, J. 255 Fujioka, Y. 503, 1249 Fujisawa, T. 503, 983, 1249, 1494 Fukamachi, S. 1276 Fukuda, M. 503, 983 Fuller, J.H. 599 Fumelli, P. 711 Fürnsinn, C. 864

## G

Gagg, J. 1482 Gale, E. A. M. 816 Gallart, T. 62 Galli-Kienle, M. 739 Gallus, G. 306 Galluzzo, A. 953, 1449 Gambardella, A. 1295 Garancini, M.P. 306 Garbin, U. 1122 Garcia de los Rios, M. 378 Gardiner, T.A. 1271 Gedulin, B. 642 Geisen, K. 269 Gelfand, R.A. 1307 Gemma, M.L. 318 Genovese, S. 816 George, E. 1183 Gessl, A. 1367 Ghirlanda, G. 848 Giaccari, A. 518 Giannoukakis, N. 715 Gillies, S. 1110 Gillmer, M.D.G. 693 Gilon, P. 879 Giordano, C. 953, 1449 Giordano, M. 732, 953, 1449 Girard, J. 283 Girotto, S. 318 Gispen, W.H. 251 Giugliano, D. 123 Going, T.C.D. 889 Gomis, R. 62 Goode, N.P. 1455 Gormley, M. 853 Gorska, J. 1443 Gothefors, L. 874 Goubet, S. 1110 Gould, G. W. 661 Gould, M.M. 1110 Gourgon, R. 726 Gower, L.F. 236 Gragnoli, C. 848 Gram, J. 73 Grasso, G. 55 Gray, D. W. R. 1014 Greco, A.V. 848

Green, A. 823

Greenwood, R. H. 1055 Gries, F. A. 351, 1397, 1425 Griffin, M. 1300 Gromada, J. 1025 Grønbæk, H. 135 Groop, L. 344, 1246, 1466 Groop, L. C. 363 Gruden, G. 1218 Grzeszczak, W. 1443 Guest, P. C. 277 Günöz, H. 629 Gutierrez, L. M. 860 Gutierrez-Lopez, M. D. 378

### H

Haffner, S.M. 1176, 1328 Hagura, R. 748 Hahn, A. 936 Haines, A.P. 1110 Hakalax, J. 97 Hakulinen, A. 97 Halban, P. 1375 Hales, C.N. 124, 277, 1176, 1239, 1358 Hamada, Y. 503, 983, 1249, 1494 Hamaguchi, H. 1434 Hammersley, M.S. 693 Hammes, H.-P. 269, 656 Hanafusa, T. 667 Haneda, M. 536 Hanefeld, M. 1425 Hanis, C.L. 1479 Hansen, B. 680 Hansen, B.V. 798 Hansen, F. 1082 Hanson, R.L. 187, 221, 1487 Hanssen, K.F. 1197 Hardisty, C. A. 1183 Hardy, K. J. 124 Harper, R. 853 Harris, A. 135 Harris, N. 1183 Harrison, L.C. 125 Hashimoto, N. 211 Hashiramoto, M. 193, 1489 Haslbeck, M. 1345 Hattersley, A.T. 693, 1055 Hauner, H. 764 Hawrami, K. 481 He, Q. 291, 430 Heaney, A.P. 853 Heine, R.J. 86 Hejnæs, K.R. 14 Heller, S. R. 1183 Hellerström, C. 543 Hennessy, T.R. 959 Henquin, J.C. 879 Henriksen, F.L. 326 Hermans, M.P. 253 Hermansen, K. 1069 Hetherington, C.S. 699 Heuvel, L. P. W. J. van den 161 Hibberd, M. 1495 Hibberd, M.L. 623 Hillier, C. 467 Hilsted, J. 680 Hiltunen, M. 705 Hirata, K. 1434

Hirokawa, J. 201 Hirose, H. 1276 Hitman, G. A. 481, 752, 1223 Höglinger, O. 126 Holman, G.D. 661 Holman, R.R. 948 Holst, J. J. 720 Holthuizen, P.E. 927 Hopmeier, P. 122 Horikoshi, H. 24 Houwing, H. 919 Howard, B.V. 1213, 1328 Huang, X. 1246, 1466 Hubert, P. 180 Hutton, J.C. 277 Hvidberg, A. 680 Hyllienmark, L. 685 Hyöty, H. 705

### I

Ikeda, H. 772 Ikegami, H. 503, 983, 1249, 1494 Iles, R. A. 889 Inada, M. 667 Inman, L. R. 173 Ipsen, H. 680 Ipsen, M. 592 Isami, S. 422 Ishida, H. 24, 772 Ishida, Y. 193 Ishikawa, T. 649 Itakura, M. 255, 381 Ito, K. 1276 Itoh, N. 667 Ivarsson, S. A. 1371 Iwahana, H. 381 Iwaoka, H. 211 Izzo, A. 306

## J

Jackson, N.C. 1007 Jacobsen, N.O. 525 Jacobsson, L.T.H. 221, 1487 Jakobsen, J. 1191 James, R. W. 711 Janus, E.D. 604 Jaraquemada Pérez de Guzman, D. 876 Jarjour, I.T. 1090 Jeandidier, N. 577 Jeanrenaud, B. 998 Jenkins, D. 750 Jensen, P.K. 525 Jensen, T. 73 Jerums, G. 387, 1493 Jespersen, J. 73 Jimi, S. 1434 Jinnouchi, H. 422 Johnson, A. 1300 Johnston, G.D. 853 Jonas, J. C. 879 Jones, R. H. 1007 Jørgensen, L.N. 592 Jörneskog, G. 474 Jou, T.-S. 1490 Juliard, J.M. 726

Melchers, I. 351

Kadowaki, T. 809 Kadrnka-Lovrenčić, M. 550 Kahri, J. 344 Kajimoto, Y. 585 Kaku, K. 942 Kalhan, S.C. 831 Kallio, V. 487 Kalmijn, S. 1096 Kamada, T. 585 Kammerer, C.M. 314, 1483 Kanamuro, R. 809 Kanatsuka, A. 211 Kanazawa, Y. 748 Kanda, F. 193 Kande, J. 283 Kaneko, T. 942 Kanstrup, I.-L. 565 Kaplan, D.L. 46 Kaprio, E.A. 97 Karasik, A. 753 Karasu, Ç. 129 Kardorf, J. 351 Karjalainen, J. 705 Karonen, S.-L. 106 Kasuga, M. 193, 1489 Katashima, R. 381 Kato, S. 24, 772 Katsumori, K. 792 Kawaguchi, Y. 503, 1494 Kawai, K. 274 Kawakami, Y. 201 Kawamori, R. 585 Kawata, S. 667 Kazumi, T. 193 Keavney, B.D. 948 Keegan, A. 1475 Kekäläinen, P. 617 Keller, C.K. 1443 Kelley, G. G. 986 Kemp, G.J. 1205 Ketelslegers, J.M. 253 Kihara, M. 914 Kikkawa, R. 536 Kikuchi, S. 1434 Kimmel, P.L. 31 Kimmerle, R. 227 Kirsch, C.-M. 1345 Kisanuki, K. 422 Kishikawa, H. 422 Kishimoto, M. 193, 1489 Kitagawa, T. 236 Klein, H. H. 757 Klein, R. 437 Klemens, C. 1397 Klöppel, G. 1405 Kluft, C. 73 Knip, M. 705, 1042 Knowler, W.C. 187, 221, 1487 Knudsen, P. 344 Knyazev, Yu. A. 749 Kocova, M. 378 Kodama, M. 585 Kofod, H. 1025

Kohner, E.M. 437

Koivisto, V. A. 106 Kokai, Y. 255

Kolb, H. 351, 1397

Kondo, T. 201

Kolb-Bachofen, V. 1397

Kono, N. 667 Kotanko, P. 126 Kotzke, G. 757 Kozka, I.J. 661 Kraats, A. A. van 161, 1169 Krarup, T. 680 Krejs, G.J. 122 Krolewski, A.S. 1486 Kromhout, D. 839, 1096 Kubota, M. 585 Kukuvitis, A. 715 Kullenberg, K. 216 Kumaran, K. 831 Kuroki, H. 792 Kuusisto, J. 617, 1176 Kuwajima, M. 667

### L

La Greca, N. 1131 Laak, J. A. W. M. van der 1169 Laakso, M. 487, 617, 1176 Lacka, B. 1443 Lahdenperä, S. 344 Lam, K.S.L. 604 Lampasona, V. 816, 968 Lampeter, E.F. 351, 1397 Lancaster, M.E. 877 Landau, B.R. 831 Lapolla, A. 1076 LaPorte, R.E. 236 Larkins, R.G. 298 Larsen, F.S. 14 Launer, L.J. 1096 Laurila, E. 1466 Lauro, R. 445 Lawrence, I.G. 467 Lazzari, P. 306 Lévy-Marchal, C. 823 Le Beau, M. M. 1466 Le Marchand-Brustel, Y. 1148 Leblanc, H. 726 Lebovitz, H.E. 1307 Lecerf, L. 798 Ledermann, H.M. 1482 Lehmann, R. 1313 Lehto, M. 1246, 1466 Lehto, S. 487 Leibiger, B. 112 Leibiger, I.B. 112 Leinikki, P. 705 Lemieux, S. 631 Lenti, L. 1117 Leonetti, F. 518 Leow, C.K. 1014 Lernmark, Å. 1353 Levy, J.C. 693 Levy-Marchal, C. 370 Li, X.-B. 1138 Lier, H.J.J. van 124 Lilja, B. 1003 Lin, B.J. 1490 Liu, Q.Z. 187 Liu, Y.Y. 445 Länne, T. 1082 Lo Cascio, V. 1122 Lobisch, M. 1425 Lomas, J. 1412

Longhi, R. 445

Lorenzi, M. 785

Lounamaa, R. 705 Love, A. 1285 Low, P.A. 914 Lucentini, L. 848 Ludvigsson, J. 685 Lund, S. 1230 Lutale, J. 610

MacCluer, J.W. 314, 1483

MacDonald, M.J. 125

Macdonald, I. A. 1183, 1412

# M

Mackaay, A.J.C. 86 MacKay, P. 145 Mackie, A. D. R. 1055 MacLeod, J.M. 610 Madsbad, S. 680 Madsen, K.L. 403 Mäenpää, J. 97 Maffettone, A. 1419 Magni, F. 739 Mahadevan, P. 298 Majid, A. 376 Mäkimattila, S. 555 Makino, H. 211 Malik, R. 874 Malkki, M. 617 Malmström, R. 555 Manara, E. 306 Mangles, D. 623 Manhem, P. 1003 Mannan, N. 1239 Maran, A. 1412 Marchello, M.J. 881 Marco, R. de 672 Mares, J. 153 Marfella, R. 123 Mariani, E. 573 Marietti, G. 848 Marmot, M.G. 630 Marozzi, G. 848 Marshall, M.O. 14 Marshall, S.M. 610 Martín, F. 860 Martin, S. 351 Maruyama, A. 792 Maruyama, H. 1276 Massucco, P. 936 Masuda, K. 24 Matsubara, A. 942 Matsubara, H. 772 Matsushima, H. 585 Matsushima, M. 236 Matsutani, A. 942 Matsuzawa, Y. 667 Matteoli, M.C. 848 Matthews, D. R. 948 Mattiello, L. 936 Mauricio, D. 633 Maury, J. 283 McCance, D. R. 187, 221, 1487 McCarthy, M. I. 481, 1223 McKeigue, P.M. 630 McKinlay, S. 356 McLeish, R. 1358 McLellan, J.A.S. 693 McNally, P.G. 467 Meißner, H.P. 1425 Melamies, L. 106

Menzinger, G. 804 Mersiyanova, I.V. 749 Mertz, R.J. 877 Metcalfe, K. 752 Metcalfe, K. A. 1223 Metelko, Ž. 550 Meuer, S. 437 Michaelis IV, O.E. 31 Miettinen, H. 1328 Mijovic, C. 750 Mikhailidis, D.P. 632 Mild, T. 1249 Millward, A. 1495 Millward, B. A. 623 Minei, S. 809 Misra, A. 251 Missler, U. 757 Mitchell, B.D. 314, 1483 Miura, T. 24 Miyamoto, S. 211 Miyamura, N. 422 Mizuno, N. 772 Mochizuki, H. 461 Mogensen, C.E. 1069, 1191 Moghetti, P. 318, 672, 1122 Mohamed-Ali, V. 356, 1110 Mohapatra, A.K. 251 Moller, D.E. 757 Montemurro, A. 445 Monti, L.D. 739 Monticone, G. 804 Moody, A.J. 14 Morales, J. 633 Moreo, G. 573 Morgan, R. 376 Morris, P.J. 1014 Morris, S. J. 1337 Morten, K.J. 868 Mortensen, E. 14 Morviducci, L. 518 Moya, F. 860 Muggeo, M. 318, 672 Muggli, E. 1131 Mularoni, E. 936 Mulder, H. 395 Mulec, H. 216 Multari, G. 848 Murakami, D. 381 Muñoz, A. 62 Mykkänen, L. 1176, 1328 Myrup, B. 73

# N

Nagi, D.K. 187 Naito, Y. 649 Nakagawa, A. 262 Nakagawa, Y. 503, 983, 1249, 1494 Nakajima, H. 667 Nakayama, N. 1033 Naoumova, R. 959 Naruse, K. 792 Naruse, M. 792 Nauck, M.A. 720 Navalesi, R. 599 Neeling, J.N.D. de 86 Neubauer, M. 122 Neuschuler, R. 804

### Nevo

Nevo. N. 753 Niedermann, K. 1313 Nielsen, B. 135 Nielsen, F.S. 592, 798 Nielsen, J.F. 1191 Nielsen, S. 1069 Nielsen, S.L. 565 Nishimura, C. 255 Nishimura, M. 772 Nishizawa, H. 585 Nissinen, A. 481, 839 Nobel, E. de 124 Nöel, M. 927 Nolan, K. M. 889 Noonan, K. 1239 Norazmi, M.N. 875 Nyberg, G. 216, 1197, 1320

# 0

Öberg, C. 153 Odawara, M. 377, 1004, 1488 Ogihara, T. 503, 983, 1249, 1494 Ohashi, S. 274 Ohneda, M. 173 Okamoto, Y. 24, 772 Olivetti, C. 1218 Öllinger, K. 635 Omori, Y. 792, 809 Ongagna, J.-C. 370 O'Rahilly, S. 868 Orchard, T.J. 236 Orho, M. 1246 Orsetti, A. 494 Ørskov, C. 720 Ørskov, H. 135 Osakovsky, V.L. 749 Osei, K. 1103 Østerby, R. 135, 1197, 1320 Owens, D. 1300 Oxenbøll, B. 680 Ozanne, S.E. 277

# P

Paci, F. 848 Padma, M. V. 251 Pagano, G. 1218 Paillole, C. 726 Pang, R. W. C. 604 Paolisso, G. 1213, 1295 Papadopoulos, G.K. 1251 Paquis-Fluckinger, V. 1485 Parisi, L. 804 Parisi, V. 804 Park, Y.H. 1138 Parving, H.-H. 592, 798 Pasmantier, R. 1307 Passa, Ph. 726 Pastore, M.R. 816 Patanè, G. 779 Patterson, C. 823 Patti, L. 1419 Pavlić-Renar, I. 550 Pawlowski, B. 227 Peakman, M. 875 Pedersen, M. 680 Pedersen, O. 481, 1230

Pekkanen, J. 839 Pelissier, J.F. 1485 Pennafina, M. G. 848 Percy, A. 642 Perez-Bravo, F. 378 Pernini, C. 804 Perrone, F. 848 Petrovsky, N. 125 Petruschke, Th. 764 Pettermann, M. 1367 Pettitt, D. J. 187, 221, 1487 Pfützner, A. 351 Phillips, D. I. W. 1205 Pieber, T.R. 122 Pietropaolo, M. 351 Pilcher, C. C. 1130 Pinget, M. 577 Pinkney, J. 454 Pinkney, J.H. 356 Pipeleers, D.G. 543 Pirisi, M. 1484 Pisano, L. 848 Pizzamiglio, G. 573 Podar, T. 975 Podestá, F. 785 Poirier, O. 798 Poli, F. 968 Polychronakos, C. 715 Poma, R. 739 Pometta, D. 711 Popovtzer, M. 899 Porkka, K. V. K. 1042 Pouget, J. 1485 Poulsen, P.L. 1191 Poulton, J. 868 Powell, J.M. 413 Pozza, G. 739 Pozzilli, P. 126, 848 Prašek, M. 550 Previti, M. 1117 Prochazka, M. 461 Proietto, J. 1389 Puig-Domingo, M. 633 Pujol-Borrell, R. 876 Pulido, N. 1262 Purrello, F. 39, 779 Purrello, R. 39 Puukka, P. 487 Puxeddu, E. 244 Pyörälä, K. 487, 1176

# Q

Ouatraro, A. 123

### R

Rabuazzo, A.M. 39,779 Radda, G.K. 1205 Radica, A. 550 Rafaeloff, R. 906 Raitakari, O.T. 1042 Ramachandran, A. 481 Rasch, R. 525 Rasmussen, M.H. 680 Rasmussen, O.W. 1069 Ratcliffe, P.J. 948 Ravussin, E. 1213 Raynaud, E. 494

Razzaque, M.S. 632 Réville, Ph. 577 Reaven, G.M. 3 Reboldi, G. 244 Reckless, J.P.D. 661 Rees, A. 376 Reig, J.A. 860 Reinhart, L.J. 314, 1483 Reisinger, E.C. 122 Repetti, E. 1218 Rewers, M. 1353 Riccardi, G. 1419 Richiusa, P. 953, 1449 Ricort. J.-M. 1148 Rigoni, A. 1122 Rink, T.J. 642 Ritz, E. 1443 Ritzel, R. 720 Rivellese, A.A. 1419 Rizza, R. 337 Rizzarelli, E. 39 Robbins, D. 1328 Roca, P. 123 Roe, M. W. 877 Roep, B.O. 351 Rogge, L. 816 Roglić, G. 550 Röhrig, K. 764 Romano, G. 1419 Rönnemaa, T. 487, 1042 Roques, M. 180 Rosart-Ortega, F. 577 Rösen, P. 509, 1157 Rösen, R. 509 Rosenberg, L. 906 Rosenmann, E. 899 Rossing, P. 73, 798 Roth, T. 785 Routsias, J. 1251 Rovira, A. 1262 Ruhnau, K.J. 1425 Ruiz, J. 726 Rump, A.F.E. 509 Ruotolo, G. 306 Russ, M. 764 Russo, P. 55 Ryan, C.M. 1090 Ryan, I. 1307 Rydén Ahlgren, Å. 1082

# S

Saito, S. 792 Saka, N. 629 Sakamoto, K. 536 Saker, P.J. 1055 Saku, K. 1434 Sakura, H. 809 Samols, E. 262 Sampson, M.J. 454 Sanaka, M. 809 Sanderson, A.L. 1205 Sandler, S. 153 Santeusanio, F. 244 Santopadre, G. 848 Santoro, A.M. 39 Sapin, R. 577 Saruta, T. 1276 Sasaki, K. 377 Sato, T. 1033

Sbraccia, P. 518 Schmelzer, J.D. 914 Schmitz, O. 565 Schnedl, W.J. 122 Schnell, O. 1345 Schulte, B. 351 Schumann, W.C. 831 Schuster, D.P. 1103 Schütt, M. 757 Schütte, K. 1425 Scionti, L. 244 Scorsone, A. 953 Scott, F. W. 1138 Seino, Y. 24, 772 Selvais, P.L. 253 Seraglia, R. 1076 Serrano-Rios, M. 378 Šestan-Crnek, S. 550 Sesti, G. 55, 445 Shah, V.O. 46 Shen, G. 503 Shen, G.-Q. 1249 Sheridan, B. 853 Sherratt, E.J. 1482 Shibata, M. 503 Shichiri, M. 422 Shigeta, Y. 536 Shima, K. 1494 Shimada, F. 211 Shimizu, M. 809 Shires, M. 1455 Shirotani, T. 422 Shojaee-Moradie, F. 1007 Shore, A.C. 1337 Sigal, R.J. 1486 Signore, A. 848 Silvestre-Aillaud, P. 1485 Simell, O. 97 Simell, T. 97 Simpson, L.O. 872 Sipilä, I. 97 Sirolla, C. 711 Sivan, E. 753 Sivieri, R. 1218 Sjølie, A.K. 437, 599 Skepper, J.N. 413 Skrabal, F. 126 Slavin, B.M. 959 Smith, J. V. 1051 Smith, U. 79 Smits, P. 116 Snehalatha, C. 481 Somoza, N. 62 Somville, T. 227 Sonesson, B. 1082 Songini, M. 1491 Sönksen, P.H. 959, 1007 Sorbini, C.A. 244 Soria, B. 860 Soulis-Liparota, T. 387, 1493 Spencer, B. 877 Spielman, R.S. 1479 Spinas, G. A. 1313 Spiro, M.J. 291, 430 Spiro, R. G. 291 Stagner, J. I. 262 Standl, E. 1345 Stassi, G. 953, 1449 Stefani, I. 739 Steffens, A.B. 919

Stegmayr, B. 1061

Stemplinger, J. 1345 Stengård, J.H. 839 Stephenson, J.M. 599 Stern, M. P. 314, 1328, 1483 Stevens, E.J. 129 Stijnen, T. 1096 Stirling, B. 1479 Stitt, A.W. 1271 Stoffel, M. 1055 Strandell, E. 153 Strandgaard, S. 565 Stratton, I.M. 948 Stridsberg, M. 395 Strödter, D. 656 Strojek, K. 1443 Strubbe, J.H. 919 Suárez, A. 1262 Sundkvist, G. 1003, 1082 Sundler, F. 395 Suppa, M. A. 848 Svanberg, L. 1371 Svendsen, I. 14 Syed Ali, S. 269

# T

Tachi, Y. 377 Tada, K. 1004 Tagami, S. 201 Taguchi, T. 632 Tai, T.-Y. 1490 Tajima, N. 236 Takahashi, Y. 381 Takekawa, K. 503, 983, 1249, 1494 Tamburrano, G. 518 Tamura, S. 667 Tanaka, M. 381 Taniguchi, K. 649 Tanizawa, Y. 942 Tanti, J.-F. 1148 Tantucci, C. 244 Tao, T. 942 Tarnow, L. 798, 1496 Tashiro, Y. 1276 Taskinen, M.-R. 344, 363 Tataranni, P.A. 1213 Taylor, D. J. 1205 Teodonio, C. 848 Teppo, A.-M. 363 Tesfaye, S. 874 Testi, R. 1449

Thien, T. 116 Thomas, A. W. 376, 1482 Thompson, C.H. 1205 Thompson, C.S. 632 Thompson, G.R. 959 Thomsen, C. 1069 Thurston, H. 467 Tobin, B. W. 881 Todaro, M. 953, 1449 Toide, K. 1033 Tomasini, L. 739 Tomita, K. 667 Tomkin, G. H. 1300 Tomlinson, D. R. 129 Tomonari, A. 381 Tooke, J.E. 1337 Torffvit, O. 525, 1492 Tortoriello, R. 1295 Tosi, R. 126 Traldi, P. 1076 Trischitta, V. 55, 445 Trovati, M. 936 Trucco, M. 378 Tsuda, K. 24 Tsuura, Y. 24, 772 Tubes, M. 1397 Tull, E.S. 236 Tuomilehto, J. 481, 752, 839, 975, 1223 Tuomilehto-Wolf, E. 481, 752, 975, 1223 Tuominen, J. A. 106 Turk, D. 337 Turner, R. C. 693, 948, 1055

### TI

Uccioli, L. 804 Uchigata, Y. 809 Ueda, H. 503, 983, 1249, 1494 Uehara, M. 422 Uhari, M. 1042 Uhlmann, M. 269 Umpleby, A. M. 959 Unger, R. H. 173 Ura, S. 422 Urakami, T. 748 Urata, Y. 201 Urbanavicius, V. 79 Uring-Lambert, B. 577 Usac, E. F. 62 Utriainen, T. 555

### V

Vaag, A. 326 Valdez, R. 1328 Van der Leest, J. 919 Van Obberghen, E. 1148 Van Suylichem, P.T.R. 919 Vargas Punti, M. D. 445 Varricchio, M. 1295 Veerkamp, J.H. 161 Vela, B.S. 46 Velasquez, M.T. 31 Vergani, D. 875 Verlato, G. 318, 672 Vestergaard, H. 1230 Veves, A. 1051 Vialettes, B. 1485 Viberti, G. C. 252, 599, 1197, 1320 Vigneri, R. 39, 779 Viikari, J.S.A. 1042 Vinci, C. 39 Vine, W. 642 Vinik, A.I. 906 Virtala, E. 975 Visalli, N. 848 Viswanathan, M. 481 Viñas, O. 62 Vokac, A. 1313 Voldsgaard, A. I. 592 Vries, H. de 86

# w

Wagner, L. 1367 Wagner, R. 351 Wahren, J. 831 Wakisaka, M. 291 Walbank, H. 1475 Wald, H. 899 Waldhäusl, W. 864, 1367 Walker, J.D. 252, 1197, 1320 Walker, M. 699 Walker, M.G. 1051 Wang, R.N. 1405 Ward, J.D. 874 Wareham, N.J. 1358 Warley, A. 413 Warren-Perry, M. 1055 Wasada, T. 792 Watanabe, Y. 274, 792 Watt, M.J. 1285

Watt, P.A. C. 467 Watts, G. F. 959 Weiss, A. 269, 656 Welsh, M. 153 Westermark, P. 543 Wetzels, J. F. M. 124 Williams, D. R. R. 1358 Williams, S. C. R. 889 Wollmer, P. 1082 Worley III, J. F. 877 Wu, H.-P. 1490

### Y

Yamada, T. 255 Yamagata, K. 667 Yamaoka, T. 255 Yamasaki, Y. 585 Yamashita, K. 255, 274, 377, 1004, 1488 Yamato, E. 503, 983, 1249, 1494 Yanagisawa, K. 809 Yasuda, K. 772 Yki-Järvinen, H. 555, 1378 Yokota, C. 274 Yoon, J.-W. 1138 Yoshida, K. 201 Yoshida, S. 211 Yoshimoto, K. 381 Young, A. A. 642 Young, M.J. 1051 Yu, L. 1353 Yudkin, J.S. 356, 454, 1110

# Z

Zager, P.G. 46 Zaß, R.-P. 227 Zawalich, W.S. 986 Zenere, M. 318 Zenti, M.G. 1122 Zerbini, G. 785 Zhang, H. 635 Zhang, Y. 1055 Ziegler, D. 1425 Zoppini, G. 318 Zorretta, D. 518

# Subject Index

KEY: A = Abstract in Supplement 1; b = Book review; c = Correspondence; r = Review or Debate; w = Workshop report

A-cell, islet - insulin receptor 422

Acetyl carnitine - nerve, effect on A7, A8 Acetylcholine - islet cell function, effect on diabetic rat 1276

Adenosine deaminase - gene - MODY not linked 1055

Adhesion - kinase - focal - glomerular diabetic rat 1131

molecule - diabetes, serum levels in 1122

- intercellular 1122

endothelial cell - glucose, effect of' 1367, A 53

- - - microalbuminuria and A211

- - serum - Type 1 diabetes A 260

- - - Type 2 diabetes A41

- platelet - endothelial cell, expression by - glucose effect 1367

soluble - E-selectin - diabetes, serum levels in 1122

vascular 1122

Adipocyte [see also Fat; GLUT]

glucose transport - chronic insulin exposure, effect of 1148

- human vs rat 661

- human - cultured 764

insulin receptor - signalling 1148

insulin resistance - insulin-induced 1148

insulin sensitivity - regional variation A 141

lactate production A12

- non-esterified fatty acid release A 144

tumour necrosis factor, effect of 764 Adipose tissue [see Fat]

Adrenoceptor - β<sub>2</sub> - expression - salt sensitivity, reduced in 126c

 $\beta_3$  - gene - insulin resistance and A 35 expression - islet - measurement A 130

Adrenomedullin A 108

AGE [see Glycation - advanced end-product /

Age - islet B-cell, changes in A94

old - cognitive function and glucose tolerance 1096

Ageing - glucose transport, effect on - rat adipocyte A 134

- islet, effect on A 107

Albert Renold Fellowship 1995 - Paola Fioretto EASD News Section 10/95 43

Albumin excretion rate - blood pressure and - NIDDM 356

children of Type 2 diabetic patients 1218

diabetic retinopathy and - blood pressure and 599

diurnal variation A213

glomerular heparan sulphate and - diabetic rat 161

heritability A63

- hyperinsulinaemia, effect of A149

octreotide, effect of - diabetic rat 135 Alcohol - abuse - diabetic autonomic neuropathy and A 240

- peripheral vascular disease and A 268

Aldose reductase - diabetic nephropathy, role in - rat 387

ervthrocyte vs nerve levels A 237

- expression - kidney - galactose-fed rat

- human - transgenic mouse, effects in 255

- inhibitor - diabetic neuropathy A237 experimental neuropathy, effect on A 232

ponalrestat - experimental nephropathy 387

therapy - long-term A 47

- tolrestat A 237

 vascular reactivity, effects on – ponalrestat vs sorbinil A 255

zopolrestat - vascular reactivity, effect on A262

Alkali - infusion - bicarbonate plus carbonate 889

Alloxan - insulin-secreting cell toxicity oxidative stress, role of 635

Amino acid - insulin secretion, effect on A 101, A 102

transporter - islet B-cell A 111 Aminoguanidine - diabetic nephropathy, effect on - rat 387

diabetic retinopathy, failure to prevent rat 269

islet B-cell, effect on A95

- islet glucotoxicity, effect on A 93

nerve, effect on - diabetic rat A 233

renoprotective effect A 47

- therapy - diabetic retinopathy - diabetic rat 656

treatment - vascular reactivity, effect on A 262

vascular proliferation, effect on - diabetic rat A 255

Amputation - diabetes A271, A272 Amylin - amyloid formation - human islet xenograft in nude mouse 543

analogue - AC137 - metabolic effects A 193

- IDDM, use in A44

– gastric emptying, effect on A32

antagonist - GI150747A - insulin secretion, effect on A113

cytotoxicity? A91

gastric emptying, effect on - diabetic BB rat 642

expression - insulin expression compared 395

gestational diabetes, in A282

insulin resistance, role in - NIDDM families A 152

kidney, binding in - juxtaglomerular apparatus A131

processing A92

regulation A92

renin-angiotensin system, effect on

secretion - pro-amylin cleavage A 27 Amyloid, islet - apolipoprotein E, role of human islet transplanted to nude mouse

Angiotensin - converting enzyme - inhibitor - captopril 509

diabetic nephropathy A 206, A 218-A 221

glucose transport, enhancement of A 142

- - microvascular effect - diabetes A 49

 – – myocardial perfusion, effect on 509 diabetes, use in A46, A47, A226

- - - retinal vascular effects A 277

 polymorphism – coronary heart disease 798

- diabetic complications and 798, A 227

- myocardial infarction 948

- II - islet, effect on A92

receptor polymorphism - complications of diabetes and A 228, A 229

Anorexia nervosa - proinsulin binding A 128

Anti-lipolytic drug /see Lipolysis - inhibitor/

Antibody - advanced glycation end-pro-

ducts A 161
- auto - Type 1 diabetes - twin study A 43

autonomic nerve - Type 1 diabetes A240, A241

- GAD A54, A87, A88

- - 69 - prediction of Type 1 diabetes 816

- - assay - ELISA A6

- - CD95 expression and A17

- - diabetic neuropathy and A 240

- - epitopic specificity A 90

- - immunosuppressive therapy, effect of A 100

-- NIDDM, in A78

 pregnancy, in – subsequent diabetes A 70

 ganglioside – diabetic neuropathy and A 240

-- GM2 A6, A90

- insulin /see Insulin - autoantibodies; Insulin - immunogenicity)

- islet-cell - 37kD - prediabetes Type 1 370

- - - tryptic fragments 816

- - 69 351, 816

- - antigen specificity and prediction of Type 1 diabetes 816

assay - immunofluorescence - quality control 633 C

time-resolved fluorescence imaging

- - B-lymphocyte subsets, release by 62

- - cord blood - Sardinia A86

immunotherapy, effect of A 100 inheritance - parental gender and

1353

prediction of Type 1 diabetes 816 protein tyrosine phosphatase - IDDM

relatives of Type 1 diabetes - gender

- seroconversion Epstein-Barr virus serology 1130c
- subtotal pancreatectomy, induced by 1397
- oxidised LDL atherosclerosis and A 26
- phospholipid diabetes Type 1 A 257. A 258
- tyrosine kinase Type 1 diabetes family
- Antidepressant glucose homeostasis, effect on A 205
- Antigen islet-cell 37kD protein tyrosine phosphatase A5, A86
- 38kD-cloned A37
- 51kD aromatic L-amino acid decarboxylase A5. A129
- GAD65 tolerance induction A98
- ganglioside GM2-1 characterisation 1117
- molecular mimicry GAD and α2macroglolulin 874c
- p69 bovine serum albumin mimicry A16
- presentation TAP peptide transporter gene 968
- Antioxidant butylated hydroxytoluene 387
- diabetic neuropathy, effect on streptozotocin-diabetic rat 1285
- lipoic acid therapy diabetic neuropathy 1425
- nicotinamide streptozotocin-diabetic rat A98
- phensuccinal streptozotocin diabetes prophylaxis A97
- probucol 387, 129
- Vitamin E heart, effect on in diabetic rat 1157
- vascular reactivity, effect on in diabetic rat 1475
- Apolipoprotein [see also Lipoprotein]
- (a) LDL bound /see Lipoprotein (a)/ polymorphism - lipoprotein (a) levels and 1434
- B haemodialysis, effect of in diabetes A 162
- CII triglyceride level and A25
- E polymorphism diabetic nephropathy progression and A 209
- Apoptosis (Programmed cell death) insulin-secreting cell A38
- islet cell G-protein, role of A 45
- T lymphocytes Type 1 diabetes 953
- triggering receptor CD95 lymphocytes, T&B - Type 1 diabetes 1449
- Artery carotid wall thickness and impaired glucose tolerance 585
- compliance diabetes, sex differences in 1082
- ultrasonic echo-tracking 1082
- Atrial natriuretic peptide glomerular hyperfiltration, role in 536
- plasma diabetes 1443
- receptor inhibitor HS-142-1 536 Audit - clinical [see Peer review]
- Auditory function diabetic neuropathy and A236
- Autoimmunity molecular mimicry as a factor 874c
- polyendocrine Type 1 aromatic L-amino acid decarboxylase A 129

- B-cell, islet /see also Islet: Insulin secreting cell; Insulin - secretion/
- age-related changes A 94
- Ca2+ A115-A121
- - insulin release by permeabilised GK rat islet 772
- - Na<sup>+</sup>/Ca<sup>2+</sup> exchanger A 27
- - repaglinide, effect of 1025
- cDNA library random sequencing insulin-secreting cell 381
- cytotoxicity IGF-1, protective effect of A 80
- nitric oxide in A81, A82
- diabetes Type 2 3r
- function diabetes Type 1 age, effect of 97
- G protein 779
- GLP-1 receptor 274
- glucagon receptor 274
- glucotoxicity glucosamine, role of 518
- GLUT 2 expression calorie restriction, effect of - fa/fa rat 173
- glycolysis A95
- injury interleukin  $1\beta$  vs nitric oxide 153
- - man vs rat A 45
- nitric oxide vs oxygen radicals A81
- ion flux hypoglycaemic agents, effects of 1025
- K<sup>+</sup><sub>ATP</sub> channel repaglinide, effect of 1025
- troglitazone, unaffected by 24
- Kearns-Sayre syndrome, in 868
- maturation neonatal rat A65
- MHC expression Class I BB rat 1138
- neogenesis from duct cell duct-ligated adult rat 1405
- signal transduction A 115-A 125
- syntaxin 860
- total volume, regulation of A85
- Biguanide [see Metformin]
- Bladder, urinary function sodium pump activity A 234
- Blood flow [see also Vascular reactivity]
- brain diabetic autonomic neuropathy A 239
- hypoglycaemia, effect of 1090
- - Doppler ultrasonography 555
- - insulin, effect of 555, A49
- - nerve 129, - - skeletal muscle - bradykinin, effect of
- A 49 - hyperinsulinaemia, effect of A 50
- - skin endothelial role A157 - laser Doppler study 555, 1337
- venous occlusion plethysmography 555
- group Lewis A78
- pressure albumin excretion rate and -EURODIAB Study 599
- ambulatory monitoring albumin excretion rate and 356
- – diabetic nephropathy 216
- - IDDM A212, A213
- – microalbuminuric Type 2 diabetes 1069
- exercise, effect of NIDDM 1313
- microalbuminuria and A212
- salt sensitivity diabetes 1443, A 214
- Body composition diabetic rat islet transplantation effect 881

- Type 1 diabetes A 150
- Bone metabolism diabetes A 185
- ultrasonography A 185
- Bradykinin glucose uptake, effect on A49
- Brain Isee also Cognitive function/
- blood flow diabetic autonomic neuropathy A239
- hypoglycaemia, effect of 1090, A 204
- cerebrovascular disease [see Stroke]
- function NIDDM 251c
- glucose uptake insulin, effect of A 203
- perfusion <sup>123</sup>I-iodoamphetamine singlephoton emission CT 1004c
- MELAS, in 1004c
- Breast feeding glucose tolerance in adult life and A61
- BRLP-42 [see Hypoglycaemic agent]

# C

- C-peptide renal effects Na+/K+ ATPase, role of A64
- treatment diabetic autonomic neuropathy A238
- treatment IDDM A7
- Cachexia tumour necrosis factor, role of? 764
- Calcium channel blocking agent albu-
- min excretion, effect on A219 - nifedipine - diabetes A 219
- verapamil ACE inhibitor, with A 142
- subunits insulin-secreting cell A 115, A116
- GLP-1 action, requirement for A 169
- islet B-cell /see B-cell, islet; Insulin secretion/
- Capillary blood cell velocity diabetes 467
- density skin Type 2 diabetes A 262
- myocardial streptozotocin-diabetic rat
- permeability glucose insulin-sensitive transport in A149
- diabetes A216, A262 Cardiolipin antibody [see Antibody - phos-
- pholipid/ Cardiovascular - reflex testing A 242
- risk factor ACE polymorphism in diabetes 948
- adverse childhood hyperinsulinaemia predicts 1042
- albumin excretion rate and Type 2 diabetes A 222
- - carotid artery wall thickness 585
- - diabetes, interaction with 487 - - diabetic nephropathy, in 798
- epidemiology A 223 - - exercise, effect of - NIDDM 1313
- gender, effect of A 224, 1082 hyperinsulinaemia and - specific insu-
- lin assay 1110
- lipoprotein (a) 711, A251 Carnitine - diabetic neuropathy 123c
- nerve, effect on in diabetic rat A 233 Carotene - \( \beta \) [see Antioxidant]
- Castello Pedroli Prize 1995 Rudiger Landgraf EASD News Section 10/95 42
- Cataract lycopen, inhibition by A 276 - thioctic acid, protection by A 276

# Catecholamine

Catecholamine - hypoglycaemia, response

insulin receptor expression, effect on

- islet cell function, effect on - streptozotocin-diabetic rat 1276

plasma - hyperinsulinaemia. effect of A 140

Cell-death, programmed [see Apoptosis] Cellophane wrap - hamster pancreas - islet regeneration model 906

Cerebral [see Brain]

Chaos theory - heart rate variability A241 Charcot foot A 272

Cholecystokinin - insulin secretion, stimulation of A124

Cholesterol [see also Dyslipidaemia: Hypercholesterolaemia; Lipoprotein/

- ester transfer - Type 2 diabetes A 249 - synthesis - hyperinsulinaemia and A 248

- - mevalonic acid as marker 959

- obesity A159- Type 2 diabetes A248

Chorionic gonadotrophin - retinal vascular cells, effect on A 275

CIGMA (continuous infusion of glucose with model assessment) [see Insulin - se-

Cilostazol [see Phosphodiesterase inhibitor] Cisapride - gastric emptying, effect on diabetes A 245

Clamp [see also Glucose; Insulin - secretion/

euglycaemic hyperinsulinaemic – glucos-amine effects 518

- insulin sensitivity measurment A 127

labelled glucose 699

- - limb blood flow 555

glycerol A149

hyperglycaemic - glucosamine effects

non-esterified fatty acid - childhood obesity 739

stepped hypoglycaemic 1412

Claude Bernard Lecturer 1995 EASD News Section 10/95 45

Coagulation, anticoagulation [see Haemostasis; Endothelial; Fibrinolysis/

Coeliac disease - screening test in IDDM A 51

Cognitive function - diabetes - Type 2

glucose tolerance and, in elderly men 1096

hypoglycaemia, during 1412

monitoring - hypoglycaemia, during

Collagen - endothelial cell, formation by rat heart 430

expression - diabetic nephropathy 632c

- IV - glomerular basement membrane diabetic nephropathy 1455

Colon [see Intestine]

Colour vision - tritan discrimination sensitivity - diabetes A277

Complications of diabetes - aldose reductase, role of 255

andiotensin-II receptor polymorphism A 228, A 229

- angiotensin converting enzyme polymorphism A 227, A 228

EURODIAB Study 599

Computer - autonomic function testing A 241. A 242.

insulin dose adjustment A 186

Contraceptive - intrauterine - diabetes -Russia A 282

Copper - islet, effect on - interleukin 1 ß, protection against 39

Cori cycle - diabetes - Type 2 326 Cushing's disease – hyperinsulinaemia in – β-endorphin role A112

Cyclic nucleotides - vascular smooth muscle 936

Cystic fibrosis - glucose tolerance A13 Cytochrome – P450 – CYP1A – islet, expression in A 135

Cytoskeleton - insulin action, effect on

# D

Darglitazone [see Hypoglycaemic agent thiazolidinedione/

Death - cell - programmed [see Apoptosis] Diabetes - care - France A 25

genetic syndrome - Kearns-Sayre syndrome 868

gestational A 280, A 282

- - borderline - outcome A71

- - glucose tolerance in parents 693

- - mitochondrial gene, mutant, in 809 - - multiple pregnancy A36

- - outcome of previous pregnancies A71

- - prognosis A70

screening criteria A 36, A 71

- heterogeneity A60

- maturity-onset in youth [see MODY]

- Type 1 - aetiology & pathogenesis A16 - - age at onset - genetic heterogeneity 623, A 29

- - autoimmunity - CD95 expression, role of 1449

- - childhood - residual islet B-cell function 97

 disease-modifying therapy A 97– A 100

- - - BCG (Freund's adjuvant)? 873 c

- - - diet - BB rat model 1138 - - - intensive insulin therapy A51

-- nicotinamide 848

- - genetic heterogeneity A89

infancy A89

infection, role of [see also Diabetes -Type 1 - Virus/

- - - infantile infection, protection by A 99

- - - BCG vaccination 873c

- - remission - spontaneous A 100

susceptibility - HLA-matched controls 125 c

– virus, role of – CMV 667, 705

- - - Coxsackie B - maternal infection 1371

- EBV 667, 1130c

- Type 2 - animal model - Cohen diabetic rat 899

- - NSY mouse 503

- - environmental factors 1125 r

- - epidemiology - Italy 306

insulin resistance, role of 992r, 1378r

- - insulin secretion in 986r, 992r

- - islet B-cell, role of 986r

pathophysiology 3r

prevention 1125r

Vitamin D repletion? 1239

treatment [see also Diet: Exercise: Hvpoglycaemic agent: Sulphonylurea/

**UK Prospective Diabetes Study** A 24

Diacylglycerol-protein kinase C pathway vascular reactivity A 261

Diazoxide - derivative - BPDZ44 and BPDZ62 - islet B-cell effect A 124 Diazoxide - Type 1 diabetes - disease-mod-

ifying therapy A 99 Diet A 177 – A 178

calorie-restricted - islet B-cell GLUT-2 expression, effect on 173

diabetogenic - BB rat 1138

fat - essential fatty acid deficient - insulin secretion, effect on A 107

monounsaturated - microalbuminuric Type 2 diabetes, in 1069

postprandial insulin precursor secretion, effect on A113

unsaturated - ω-3 253c, A214

- fructo-oligosaccharides - glucose production, effect on A148

infancy - overfeeding - insulin resistance syndrome following A 166

protein - diabetic nephropathy A 216 high - diabetic nephropathy and - BB rat A 207

- hepatic glycogen synthesis, effect on A 148

- - low - pregnancy A 280

- sucrose - insulin secretion, effect on - rat

SHR/N-cp rat - glomerulopathy 31 DNA - complementary - insulin-secreting

cell library 381 Dupuytren's contracture - Type 1 diabetes

A 187

Dyslipidaemia [see also Cholesterol: Hypercholesterolaemia; Hypertriglyceridaemia; Lipoprotein; Triglyceride/ diabetes - Type 1 - black Africans A 246

- - Type 2 3r - - - treatment A 250

EASD - 30th anniversary EASD News Section 4/95

- 30th General Assembly, Dusseldorf, 1994

- abstracts (Suppl 1) A3-A285 --- Erratum. EASD News 10/95 47

- - Author Index A 287

- minutes (Suppl 1) I

- Scientists Training Course EASD News Section 11/95 49 w

Study Group - AIDSPIT (Artificial Insulin Delivery Systems, Pancreas & Islet Transplantation) - EASD News Section: 8/95 29 w

- - Diabetic Nephropathy EASD News Section 9/95, 35 w

Hypertension EASD News Section 11/

Psychosocial Aspects of Diabetes EASD News Section 7/95

ECG [see Heart - ECG] Education - diabetes A24, A180-A182 EKG, Electrocardiogram /see Heart -FCG!

Electrofusion A 108

Eli Lilly/EASD Research Fellowship 1995 EASD News Section 10/95 44

Embryo/Fetus [see also Pregnancy] Coxsackie B virus and subsequent Type 1 diabetes 1371

Embryopathy A 281

diabetic A21

butylated hydroxytoluene, amelioration by A22

Encephalopathy - diabetic 1191 Endopeptidase – PC<sub>2</sub> (proinsulin convertase 2) A105

Endorphin - hyperinsulinaemia, role in obesity & Cushing's d. A112

Endothelial, Endothelium - acetylcholine, effect of - IDDM A48

- adhesion molecule expression - glucose, effect of 1367 apoptosis - glucose triggered A 254

- endocytosis - glucose, effect of 1271 fibronectin – glucose, effect of 785

expression - protein kinase C, role of A116

- - glycation, effect of 1271

heart - matrix formation - glucose, effect of 430

Na+/H+ antiport - glucose, effect of 785

oxidative stress, effect of - mitochondrial gene deletion A 261

replication - glucose, effect of 785 - - von Willebrand factor secretion A 253

corpus cavernosum - diabetes A 238 function - hyperglycaemia, effect of -

IDDm A150 insulin transport - receptor-mediated

A 189 nitric oxide production - L-arginine, effect of A48

skin vasodilatation, role in A157

tissue factor pathway inhibitor - dia-

Vitamin E, protection by 1475 Endothelin - complications of diabetes A 264, A 265

insulin secretion, effect on A 105 plasma - ω-3 fatty acids, effect of 253 c

Type 2 diabetes, lack of effect in A 48 Energy metabolism - diabetes - islet transplantation, effect of 919

Enterostatin - insulin secretion, effect on A 15

Epidemiology - cardiovascular risk factors A 223

- diabetes A172-A176

Italy 306, 318

MODY - central Europe 1482c renal mortality - Japan vs Pennsylva-

nia, USA 236 Type 1 - age at diagnosis 823

Chile 378c Croatia 550

- - EURODIAB ACE study 823

- - risk & birth cohort 975

-- - seasonality 823

- - sex difference 975 southern Europe 1491 c

- fibrinogen, plasma - cardiovascular risk factors and A 164

- impaired glucose tolerance - cardiovascular risk factors and A 164

insulin resistance - African Americans resident vs immigrant 1103

- macrovascular disease - Hoorn study 86

nephropathy, diabetic A 215 retinopathy, diabetic A 57

stroke - diabetes 1061

Erectile failure - diabetes A 238

Erythrocyte - deoxygluconic acid A 161 diabetes - human vs streptozotocin-diabetic rat 872c

diabetes - Type 2 - pravastatin, effect of A 258

glycogen synthesis as well as glycolysis A 142

membrane composition - obesity A 159

osmotic shock ATP release - diabetes. defective in A258

EURODIAB complications study - diabetic nephropathy 599

retinal photography 437

European - Association for Study of Diabetes [see EASD]

Exendin - (9-39) - GLP-1 receptor antagonist 274, A169, A170

Exercise A179 - A182

acute - capacity - chronic renal failure 565

- - - diabetic neuropathy, effect of A 52 - - cardiovascular response - diabetic autonomic neuropathy 244

- - diabetes - Type 2 - hypoglycaemia 106 - - energy metabolism - diabetes 919

glycogen-depleting - insulin sensitivity following A50 - training - blood-flow, insulin-stimulated

A34 - diabetes - Type 2 1313- NIDDM A24

Exocytosis [see Insulin - secretion] Eye [see Cataract, Colour vision, Lens, Pupil, Retina, Retinopathy, Visual/

FAD-glycerophosphate dehydrogenase -

lymphocyte – gest. DM A 282 mitochondrial – Type 2 diabetes A 77 Family study - diabetes - gestational - glucose tolerance in parents 693

- - Type 1 A 87-A 90

- - - GAD antibody A54, A55

- - islet-cell antibodies 370, 1353 - - prediabetic CMV? 705

- recurrence risk - gender 975 - - Type 2 - albumin excretion rate 1218

insulin sensitivity and A221

impaired glucose tolerance in young

relatives A151 insulin resistance and microalbuminuria 363

insulin secretion A112

- - - islet B-cell function A12

lipoprotein (a) and apolipoprotein (a) types 1434

- - - lipoprotein abnormalities A 249

- - - maternal transmission? 314, 1482c - - Na+/H+ antiport activity A 230

- - - parental nephropathy as risk factor 221, 1486c

Fat [see also Adipocyte]

abdominal - Otsuka Long-Evans Tokushima Fatty Rat 1033

distribution [see also Obesity] - hyperinsulinaemia and A164

glucose turnover - GLP-1 (7-36 amide). effect of A170

insulin receptor tyrosine kinase activity

mass - diabetic rat - islet transplantation effect 881

regulation - NIDDM 3r

Fatty acid - essential - diabetic nerve, effect

infusion - Intralipid - insulin secretion. effect on 1285

glucose 6-phosphatase, inhition of A 144

glucose tolerance test, suppression in 1358

insulin secretion, effect on - duration of infusion 1285

islet B-cell, effect of A 96

- - serum - exercise, effect of - diabetic rat 919

-- NIDDM 3r

- - - prediabetes Type 2 1213

- unsaturated - insulin secretion, effect on

- ω-3 - endothelin-1, plasma, effect on 253 c

lipogenic enzyme expression in hHTg rat, effect on A 146

Fetus [see Embryo/Fetus] Fibrinogen [see Haemostasis] Fibrinolysis - diabetes - pregnancy A 285

- impaired glucose tolerance, in A52 oxidative stress and - diabetes A 252

Type 2 diabetes A 256 family study A52

Fibroblast - senescence - diabetic nephropathy, in A 206

Fibronectin - endothelial cell expression

- rat heart 430

Fitness, physical [see Exercise - training] Flow cytometry - T lymphocytes 953 Foetus [see Embryo/Fetus] Foot - diabetic A271-A274 Freedom Editorial 1

Fructose - bisphosphatase, 1-6 - hepatic diabetic NZO mouse 1389 insulin secretion, stimulation of A 102

G

G protein - apoptosis, role in A 45

islet B-cell, role in 779

subunits - islet cells, distribution in A116

GAD [see Glutamic acid - decarboxylase] Gait A272

Galileo Galilei Editorial 1 Gall bladder - hyperglycaemia, effect of

Ganglioside - islet - GM2-1 1117 Gas chromatography mass spectrometry

Gastric - bypass surgery - obesity & NIDDM, effect on A 158 emptying A244, A245, A31, A32

## Gastrin

- - amylin, effect of - diabetic BB rat 642 – assessment – 3-3H glucose gavage – rat

642 - diabetic ketoacidosis, impaired in - fat-

ty acids, role of 632c - - GLP-1, effect of A39

- hyperinsulinaemia, effect of 79

Gastrin - diabetic gastroenteropathy - cisapride therapy A 245

releasing peptide (GRP) - insulin-secreting cell, effect on A119

Gastrointestinal - function A 244-A 246 motility - hyperinsulinaemia, effect of

Gastroplasty - obesity, in A158 Gene - cDNA library - insulin-secreting

mitochondrial [see also Maternally-inherited diabetes with deafness/

diabetes - Type 2 - pregnancy outcome 809

endothelial cell - oxidative stress, deletion induced by A261

- - Kearns-Sayre syndrome 868 - - mutation - diabetes 193, A 229

- - - gestational diabetes 809

--- methods 376c, 377c - - - non-diabetic kidney disease A 229

-- Type 2 diabetes A34, A75, A76

--- cerebral perfusion 1004c - reg - expression - regenerating hamster islets 906

- regulation - GLUT 2 112

 TAP (antigen processing transporter) – Type 1 diabetes A72

transfection - islet cells A28 Genetics [see also Family study, HLA, In-

heritance, Polymorphism/ complications of diabetes A 227-A 230

diabetes - Type 1 A 28, A 72

30th Minkowski Lecture EASD News Section 10/95 39

– – CD4 linkage A 29

– – CTLA4 microsatellite A29

- - - heterogeneity - age at onset 623, 748c

- - HLA [see also HLA] - DR 1251 susceptibility vs heterogeneity

1493c – – Ins-IGF2 – parental imprinting 715

- - - insulin gene - HLA interaction 1223 - - interferon γ A 29

-- TAP2 gene 968 - - Type 2 A 34, A 74

- - adenosine deaminase gene not linked 1490c

- - glucagon receptor gene 975, 1246

GLUT-2 polymorphism 942

glycogen synthase gene 1249 c

– – hexokinase gene 1466

 – – insulin receptor substrate-1 gene 481 linkage study - Japanese A 35

- - maternal inheritance 314, 1482c

--- MODY 1055 sulphonylurea receptor gene not linked 1479

- insulin resistance - Pima Indians 461

- twin study A 140- MODY 1055, A 60

GIP - receptor - expression - islet B-cell A 131

Glicentin - recombinant - actions A 130 Glomerular - basement membrane - charge

 diabetic nephropathy 1169 chondroitin sulphate proteoglycans 1455

diabetes - heparin, effect of A62

diabetic nephropathy 1455

- - heparan sulphate - diabetic rat 161 - - - associated anionic sites 1169

- electron microscopy - stereology 1197 epithelial cell - foot processes - Type 1 diabetes 1197

filtration rate - measurement 252c

- NIDDM A215

filtration slits - Type 1 diabetes 1197

filtration surface area - age at diagnosis of IDDM and A 209

focal adhesion kinase - streptozotocindiabetic rat 1131 function in diabetes - myo-inositol feed-

ing, effect of 899

hyperfiltration - atrial natriuretic peptide role? - diabetic rat 536

- juxtaglomerular arterioles - IDDM 1320

mesangial cell - glucose transport - rat

- - hyaluronan production - diabetic rat 298

IGF-I activity – glucose, effect of A62

morphometry – juxtaglomerular arterioles – IDDM 1320

- - SHR/N-cp rat 31

- - streptozotocin-diabetic rat 135

 Type 1 diabetes A 210 GLP (Glucagon-like peptide)

GLP-1, GLP-1 (7-36 amide) A 167-A 172 glycogenesis, no effect on in skeletal muscle 864

- hypoglycaemic effect Erratum, EASD News Section 10/95 47

- insulin-secreting cell, effect on - desensitization A117

receptor – expression – islet B-cell A 131

- therapy - pharmacokinetics 720

- - Type 1 diabetes A 40 - - Type 2 diabetes A 39

- insulin secretion, effect on A40

 receptor – gene – MODY not linked 1055

- - inhibitor - exendin (9-39) 274

- - islet B-cell 274

Glucagon - myocardium, effect on A129

- pancreatic acinar cells, binding to 262

postprandial suppression - Type 1 diabetes, lacking in 337

protein metabolism, regulatory role in A 23

- receptor - expression - islet B-cell A131

- - gene - diabetes - Type 2 975, 1246

- - islet B-cell 274

 secretion – GLP-1 (7–36 amide), effect of 720

- - hypoglycaemia, during - neural mediation A 203

- insulin-stimulated 422

neurotransmitters, effect of - streptozotocin-diabetic rat 1276

- sensitivity - hypoglycaemia, following

Glucagon-like peptide [see GLP]

Glucocorticoid - bone fibroblast, effect on A 125

- islet B-cell cytotoxicity, protection against A80

islet B-cell, effect on - amylin & insulin expression 395

neuropeptide Y expression induction in rat islets A 147

pulse - glucose intolerance following A 149

- receptor - islet B-cell A 128

Glucokinase - gene - islet B-cell A 15 MODY 1055, A 60

regulation-insulin-secreting cell A 115

- insulin-secreting cell - pregnancy hormones, effects of A 145

islet - glucose, regulation by A 96

anomeric specificity A76

translocation after glucose stimulation A 107

recombinant human - kinetics of isoforms A28

regulatory protein - rat models of Type 2 diabetes A146

Gluconeogenesis - diabetes - lipolysis role -NZO mouse 1389

glutamine metabolism A66 - measurement in vivo 831

Glucosamine - glucotoxicity, role in 518 glycogen synthesis, effect on - skeletal

muscle A 133 Glucose - 6-phosphatase - cDNA probe -

rat A 154 - non-esterified fatty acids, inhibition by A144

- effectiveness - measurement in vivo A 126

- obesity A159

- fatty acid cycle 326

glucose-6-phosphate cycling 337

intestinal absorption - portal insulin, effect of - mechanism A 135

- oxidation - stable isotope method A67

production - gluconeogenesis, contribution of 831

- - hepatic - assessment A31 - labelled infusion 699

- - - diabetes - Type 1 337 - - - - Type 2 326

- - - dimeric insulin analogue, effect of 1007

- - - Krebs cycle involvement 831

- - - NIDDM 3r

- New Zealand Obese mouse 1389 - - - non-esterified fatty acids, effect of

A 66 - - liver - insulin, effect of - dog A 154

- - obesity A67 - - fructose ingestion, effect of in NIDDM A151

- release [see Glucose - production]

- sensor [see also EASD - Study Group -AIDSPIT/ A183-A184

- tolerance - impaired - epidemiology 306 - - - glucagon receptor gene not associ-

ated 1246 --- heterogeneity A11

– – insulin sensitivity 699 islet function A12

- - - macrovascular disease and 86

- - - nerve function A 235

– – pathophysiology 3r

- - - pregnancy - subsequent glucose tolerance A 284

prognosis - insulin & proinsulin levels and A 166

progression - insulin response 187 cardiovascular risk factors and

A 188 - - pregnancy A 283

test - IV [see also Glucose - production; Insulin - secretion/

- - insulin sensitivity measurement A126, A127

- - - non-esterified fatty acid suppression 1358

- oral - insulin response, specific 1239 – – – reactive hypoglycaemia assess-

ment 494

Vitamin D and - London Asians 1239 - transport A132-A135

adipocyte - tumour necrosis factor, effect of 764

- - assessment - photolabelling 661

- - insulin-secreting cell - troglitazone, effect of 24

- mesangial cell - rat 291

- muscle - hyperglycaemia, effect of A10

- - Na<sup>+</sup>-coupled 291

transporter [see GLUT]

turnover - GLP-1 (7-36 amide), effect of - pig A 168

Erratum EASD News Section 10/95 47

- - measurement A125

- - obesity - childhood 739

- uptake - GLP-1, role of A 169

– skeletal muscle – hypomagnesaemic rat 1262

non-esterified fatty acids, effect of A 67

- splanchnic - OG clamp A31 Glucotoxicity [see Insulin - secretion]

GLUT (Glucose transporter) A 132-A 135 - 1 - polymorphism - single-strand conformation 942

2 - gene - promoter - insulin-secreting cell 112

- gene promoter - insulin-secreting cell A 68

islet B-cell - calorie restriction, effect of - fa/fa rat 173

polymorphism 211

- 4 - adipocyte - human vs rat 661

- expression - lipoic acid, effect of A9

- - skeletal muscle - GLP-1 (7-36 amide), effect of A172

- oöphorectomy, effect of A 130 - internalisation - insulin, effect of A9
- translocation A10

- adipocyte 1148

- - ubiquitin-conjugating enzyme association A9

downregulation by glucose - muscle A 10

expression - islet B-cell - rat vs human A 10

- nerve A9

Glutamic acid decarboxylase - 65kD - human recombinant 14

gene - Type 1 diabetes A 42

molecular mimicry: a2-macroglolulin

Glutathione - diabetes, reduced in - oxidative stress and 201

- synthesis - γ-glutamylcysteine synthetase 201

Glycaemic control - diagnosis of complications, effect of A278

diabetic nephropathy and 1007, A 208 diabetic neuropathy and A234, A235

glycogen synthase expression and 1230 haemorrheological effect A 259

intraperitoneal insulin infusion 577 lipoprotein(a)and-Type2diabetes A250

mortality, effect on - NIDDM in elderly

nerve function and - childhood IDDM 685

Type 1 diabetes - childhood A 52

VLDL subfractions, effect on? - Type 1 diabetes 1419

Glycation [see also Aminoguanidine; HbA<sub>1</sub>/ A160-A162

advanced end-product - diabetic nephropathy, in 387

kidney and A 47

albumin - matrix-assisted laser desorption ionisation 1069

inhibitor - aminoguanidine [see also Aminoguanidine 1271

D-lysine 1271 endothelial cell, effect on 1271

- insulin & proinsulin A 92

LDL 1300

Glycerol - subcutaneous monitoring for hypoglycaemia A 201

Glycogen - synthase - expression - sulphonylurea and 1230

- gene - diabetes - Type 2 1249 c

- hypertension 1249c

– long-chain acyl CoAs, effect of A 143

– Macaca mulatta A 156

- - muscle - negative feedback control A 66

--- regulation A122

– polymorphism – Type 2 diabetes A 74

regulation - protein phosphatase 1β 461

- - skeletal muscle - blood pressure and A 164

- Type 2 diabetes 326

 synthesis – protein phosphatase-1 G-subunit polymorphism A75

skeletal muscle - GLP-1 (7-36 amide), no effect of 864, A 168

- turnover - liver - glucagon, regulation by A66

Glycogenesis [see Glycogen - synthase; Glycogen - synthesis/

Glycogenin - skeletal muscle - cDNA cloned A76

Glycogenolysis - regulation - AMP kinaseactivated kinase A 143

Glycolysis - insulin secretion, role in A 101, A 102, A 122

Growth - factor - ciliary neuronotrophic factor - nerve, effect on A 233

- insulin-like [see IGF]

- - platelet-derived - diabetic retinopathy A57

transforming – complications of dia-betes and A254

 – vascular endothelial – diabetic retinopathy A57

- fetal - adult diabetic nephropathy not related A222

- - adult insulin resistance and A 136

- - adult NIDDM and A 176

maternal glucose tolerance and A 283 skeletal muscle glycolysis in adult life

and 1205 - hormone - binding protein - obesity, in

A 131 hGH<sub>44-191</sub> - diabetogenic potency reduced in rat A 155

signal processing - insulin-secreting

cell A118 very low calorie diet, response to -

obesity, lacking in A 160 Guanine nucleotides - insulin secretion, role in A 103

Gustatory sweating A 238

### н

Haemochromatosis - screening A13 Haemoglobin – fetal – diabetes A 184

glycated [see HbA1]

Graz - HbA<sub>1c</sub> assay by HPLC 122c Haemorrheology [see also Haemostasis]

diabetes A258-A260 nitrate, effect of - diabetes A 252

Haemostasis - diabetes A 256-A 258 diabetic nephropathy 73, A214

fibrinogen, plasma - cardiovascular risk factor 630c

NIDDM A166

proinsulin-like molecules and 1110

- microalbuminuria - Type 2 diabetes A 218

HAL - Class II - antigen presentation molecular structure 1251

Hamster - Syrian golden - islet regeneration 906

 $HbA_1$ ,  $HbA_{1c}$  – assay – HPLC – Hb Grazinterference 122c

inter-laboratory comparison A 184 Hearing-WBN/Kob rat, impairment in 649 Heart - cardiomyopathy, diabetic - ACE inhibitor, effect of 509

- stereology - streptozotocin-diabetic rat 413

coronary angiography 726

coronary disease A 266-A 267

diabetic autonomic neuropathy and A 243

glucose tolerance and A 20

impaired glucose tolerance, in 585

microalbuminuria and - NIDDM A222, A223

microvascular angina - insulin resistance in A152

risk factors - diabetes and 487

screening - diabetes 726

- coronary vascular reactivity - diabetes oxidative stress, role of 1157

diabetic autonomic neuropathy - scinti-

- ECG - ambulatory monitoring 726

exercise test 726

QT<sub>c</sub> - diabetes 1345

 diabetic autonomic neuropathy A 239

– – hypoglycaemia, in A18

- ventricular extrasystole - insulin resistance and A163

echocardiography – diabetes A 266

# Heat shock protein

endothelial cell - rat 430

exercise, response to - diabetes 244

- K+ATP channel sulphonylurea, effect of
- left ventricular function diabetic autonomic neuropathy A 266

Type 1 diabetes A 20

- left ventricular mass Na+/Li+ countertransport and 454
- myocardial energy status diabetic ketoacidosis, in 889
- myocardial glucagon, effect of A129
- myocardial infarction A267, A268 ACE polymorphism and 948
- mortality in diabetes A 20

- - sulphonylureas and 116r

- myocardial metabolism adrenergic activation - diabetic dog A 153
- myocardial perfusion diabetes ACE inhibitor, effect of 509
- rate variability diabetic autonomic neuropathy A 241 scintigraphy – <sup>123</sup>I-MIBG 1345

99 mTc-methoxyisobutylisonitrile 1345

- - thallium 726

sympathetic damage - NIDDM A 20 Heat shock protein - islet - cytokines, induction by A17

- man vs rat A 45

synthesis - ageing and AGEs, effects of A 160

Helicobacter pylori infection - diabetes A245, A246

Heparan sulphate - glomerular - albuminuria and - diabetic rat 161

diabetic nephropathy 1455

- proteoglycan - polymorphism - albumin excretion rate and A229

Heparin - kidney, effects on - streptozotocin-diabetic rat A 207

Hepatitis - B - vaccine - response in Type 1 diabetes A 100

 C – glucose tolerance in – interferon-α therapy A13

Hepatocyte - GLP-1 (7-36 amide), effect of A172

Hexokinase - activity reduced in NIDDM not genetic 1466

- gene MODY not linked 1055
- mutant A60
- -- NIDDM A34
- organisation 1466 - - Type 2 diabetes 1466
- polymorphism 617 skeletal muscle - phosphorylation, role of A145
- Hirata's disease [see Insulin autommune syndrome/
- HLA Class I diabetes Type 1 Finland 750c - 752c
- P3 loci Type 1 diabetes age at onset
- Class II diabetes Type 1 insulin gene interaction 1223
- --- Yakutia 749c
- - Type 2 age at onset 748 c
- --- Chile 378c
- - DQ molecular structure Type 1 diabetes 1251
  - - TAP2 - Type 1 diabetes 968
- diabetes Type 1 susceptibility vs heterogeneity 1493 c

- DM Type 1 diabetes not associated A 73
- DQ A1 promoter polymorphism -Type 1 diabetes A28
- B1 retroviral long terminal repeats -Type 2 diabetes A35
- prediction of Type 1 diabetes in families A42
- haplotype Type 1 diabetes susceptibility A72
- HMG CoA reductase inhibitor lovastatin

- diabetic nephropathy 604

pravastatin - erythrocyte, effect on A 258 HOMA (homeostatic model assessment)

[see Insulin - secretion] Hyaluronan 298

Hypercholesterolaemia [see also Cholesterol; Dyslipidaemia; Lipoprotein/

diabetic nephropathy, role in 604

Hyperglycaemia - postprandial in IDDM glucagon, role of 337

Hyperinsulinaemia - diabetic autonomic neuropathy, effect in A239

blood pressure, effect on A225

childhood - hypertriglyceridaemia, risk factor for 1042

cognitive function and 1096

gastrointestinal motility, effect on 79 insulin resistance during - insulinoma cases A150

Hyperproinsuinaemia - familial - genetics A76

Hypertension A224-A226

adverse lipid profile, with - childhood hyperinsulinaemia predicts 1042

birth weight and A176

- diabetes, with animal model A73
- EASD Study Group EASD News Section 11/95 51

kidney and 254b

- essential IVGTT findings A112
- genetics glycogen synthase gene 1249 c
- insulin resistance syndrome, in 839
- insulin sensitivity A 163-A 164
- Na+/Li+ countertransport and NIDDM
- nocturnal diabetic nephropathy, in 216
- parental microalbuminuria and A222
- treatment [see also Angiotensin converting enzyme; Calcium - channel/
- diabetes bendrofluazide, low-dose 853

retina, effects on A58

- retinopathy progression and A277 Hyperthyroidism - protein metabolism in

Hypertriglyceridaemia [see also Dyslipidaemia; Lipoprotein; Triglyceride/ 3r

cardiovascular risk factors and 1358

insulin resistance, in 344

prediction - hyperinsulinaemia in childhood 1042

renal effects in IDDM A 247

- risk factor for abnormal glucose tolerance A 249
- Hypoglycaemia A 200-A 205
- cerebral blood flow, effect on 1090

cognitive function during 1412

- counterregulation impaired following hypoglycaemia 1183
- stepped hypoglycaemic clamping 1412

- exercise-induced in IDDM A179
- fast insulin analogue, use of 106
- insulin resistance following lipolysis and A18
- physiological response to previous hypoglycaemia and A18
- pregnancy Type 1 diabetes A 282
- reactive assessment standard meal
- unawareness hypoglycaemia-induced 1183
- intensive insulin therapy, during 1412 Type 2 diabetes A 19
- Hypoglycaemic agent A 193-A 200
- 4-hydroxyisoleucine A 101 A4166 A194, A196

- BPDZ 62 A 195 BRLP-42 diabetic neuropathy, prevention of - rat A 233
- herbal fenugreek A 101
- Gymnema sylvestre A 193
- Lupinus albus A 109
- - Momordica charantia A 193
- meglitinides A 194, A 199
- molybdate A 138, A 193
- oral secondary failure insulin secretion A198
- pregnancy, use in glyburide? 753
- repaglinide 1025, A43, A194, A195
- selenium compounds A133
- sulphonylurea [see Sulphonylurea]
- thiazolidinediones A 199, A 200
- darglitazone 1307
- troglitazone 24, A199, A44

thioctic acid A 199

- troglitazone [see Hypoglycaemic agent thiazolidinediones/
- vanadate adipocyte, effect on A 141
- - insulin secretion inhibition of in normal rat A 103

- - intestine, effect on 403

- - skeletal muscle effects - tungsten compared A143

I

IAPP [see Amylin]

IDDM (Insulin-dependent diabetes mellitus) [see Diabetes - Type 1]

IGF (Insulin-like growth factor) binding protein - 1 - postprandial re-

sponses A152 2 - bladder hypertrophy and - diabetic rat A64

- retinal endothelial cell A 275
- I bone fibroblast, effect on A 125
- expression liver human vs rat A 154
- insulin secretion, regulation of A111
- nerve, effect on A8
- -- NIDDM, in A132
- receptor expression liver human vs rat A 154
- therapy IDDM A44 - - vascular smooth muscle, effect on
- A53 - II - expression - insulin-secreting cell
- 927 - tumour-induced hypoglycaemia, in
- mesangial cell, effect on A64

IGT [see Glucose - tolerance - impaired] Immunotherapy [see Diabetes - Type 1 - disease-modifying therapy] Impotence [see Erectile failure]

Incretin [see also GLP] - GLP-1 (7-36 amide) 720 Infra-red spectrometry - glucose sensor

Inheritance of diabetes - Type 1 - age at

onset A73 sex of affected parent, effect of 715, A73

- Type 2 - maternal [see also Gene - mitochondrial; MIDD/ 14, 314, 1482c

Insect cell transfection - human GAD65 Instructions for Authors Advertisement pages, Jan & July issues

Insulin - analogue A 189-A 192

- covalent dimers 1007

- - hepatoselective 1007 - - monomeric - B10Asp 592

- - lispro (Lys(B28), Pro(B29)) A3, A4, A189-A191

- exercise hypoglycaemia 106

- slow-acting A191, A192- - HOE901 A4

- NN-304 A4

--- W99-S32 A4

 antibody [see Insulin – autoantibodies; Insulin - immunogenicity/

assay - intact A 157

autoantibodies – cord blood A 90

islet-cell - B-lymphocyte subsets, release by 62

autoimmune syndrome A 91

degradation – brain – insulin species 757

gene – diabetes – Type 1 1223 – expression – regulation – amylin ex-

pression compared 395 mutant - familial hyperproinsulinae-

mia A76

promoter - TAAT motif function A65 - RFLP - Type 1 diabetes A 28 glycation A 161

immunogenicity - human A 191

intraperitoneal 577

lispro insulin A4 infusion - device - implantable 577

intraperitoneal 577

- intranasal 680

intrapulmonary A3

like growth factor [see IGF]

lispro [see Insulin - analogue - monomeric - lispro/

oral - nanoencapsulated 180

pancreatic acinar cells, binding to 262

precursors-postprandial secretion A 113

preparation – isophane – protamine, adverse effect of A 254

promoter factor 1 - islet regeneration and A45

receptor - A-cell, pancreatic 422

binding affinity - insulin resistance and A 139

brain - insulin binding - species, effect of 757

human - Chinese hamster ovary cells, transfected 180

- species specificity 757

- - internalisation - Cys 860, role of A64 - - processing - NIDDM A129

isoforms - radioimmunoassay 445

- - mutant - insulin resistance - Type A A 132

-- - Met985 - Type 2 diabetes A 77

placental isoforms - gestational diabetes A65

signal transduction A68, A69

- islet transplantation, recovery after A86

- - signalling A122-A125

--- p21ras A116

- - skeletal muscle - hypomagnesaemic rat, in 1262

- - - Otsuka Long-Evans Tokushima Fatty Rat 1033

- - substrate-1 - adipocyte 1148

- - gene - polymorphism 211, 481, A33, A74

--- promoter A33

- - tyrosine kinase - insulin resistance, in

- - - magnesium, role of 1262

- - - muscle PC1 content and A34

--- NIDDM A33

- release [see Insulin - secretion]

 resistance [see also Insulin – sensitivity] 3r, A33, A136-A141

- - abdominal obesity and A 188

- - African Americans - resident vs recently immigrant 1103

antibody-mediated - human insulin A 191

- - chronic renal failure 565

- - darglitazone, effect of 1307.

- - diabetes - Type 2 1378r, 992 r

- - hexokinase 1466 - - hexokinase II polymorphism and 617

- - hypertension in - amylin role? A 131 - - Na<sup>+</sup>/K<sup>+</sup> ATPase inhibitor role? 792

- - hypomagnesaemia, in 1262

- - impaired glucose tolerance, in 187

 insulin receptor tyrosine kinase activity 55

- - insulin-induced - adipocyte 1148

- - L-arginine, effect of - obesity A 158

- - macrovascular disease risk - oxidative stress, role of 1484c

- - microalbuminuria and A 221-A 224 – obesity – animal models 998r

- - Otsuka Long-Evans Tokushima Fatty Rat 1033

- - ouabain-like immunoreactivity 792 - - PC-1 glycoprotein, role of A65

- - protein phosphatase 1β gene not linked 461 - - streptozotocin-diabetic rat 283

- - syndrome A 163-A 166

- - - dyslipidaemia in - lipase ratio 344

- - - genetics A79

- - - hypertension, role of 839

– – LDL size in 1328

- - - Lewis phenotype and A78 - - thiazide, effect of - low-dose 853

- - treatment - troglitazone A 44

 tumour necrosis factor, role of 764 - - Type A - insulin receptor mutation

A 132

 – – phosphatidyl-inositol 3'-kinase activation impaired A137

- sc injection - computer-assisted A 186 - secreting cell - BRIN-BG7 A 108

– glucose sensitivity – different cell lines

- - human insulinoma line A 46

 – human proinsulin-transfected A84 - - IGF-II expression - glucose, effect of

- - secretory granule - sulphonylurea receptor 277

sulphonylurea receptor 277

- - transgenic pituitary A55

- secretion A15

assessment in vivo A 30

Ca2+-stimulated - permeabilised GK rat islet 772

- - diabetes - Type 2 3r, 986r, 992r

- - exocytosis 772

- syntaxin role? 860

- - fetus 124c

- GK rat - permeabilised islets 772
- GLP-1 (7-36 amide), effect of 720, A39

- - - Zucker rat A 171

 – glucagon-stimulated – glucagon receptor involved 274

glucose-stimulated - signal transduction 779

- - glucotoxicity A 110, A 46

- - - aminoguanidine, effect of A93

- - - glucosamine, role in 518

- pyruvate dehydrogenase, role of

- - imidazoline compounds, stimulation by A 95

impaired glucose tolerance 699 - - interleukin-1β, effect of 779

- - - copper, effect of 39

measurement in vivo A 126

- - modulation mechanisms 1276 neurotransmitters, effect of - strepto-

zotocin-diabetic rat 1276 non-esterified fatty acids, effect of long vs short-term 1285

NSY mouse 503

- - obesity - animal models 998r

phospholipase A2 activation, role of

signal transduction A115-A125

studies in vitro A 101–A 111 studies in vivo A 111–A 115

- - troglitazone, effect of 24 - sensitivity [see also Insulin - resistance] GLP-1 (7-36 amide), no acute effect

of A168

glucotoxicity 518

impaired glucose tolerance 699 insulin delivery route and A 125

measurement - in vivo A 125-A 127 - serum - diabetes - Type 1 - age, effect of

97 species - human insulin activity in rat?

1492c - insulin receptor binding 757

non-human - availability 1492 c

- - insulin resistance syndrome 1328 - specific - serum - cardiovascular risk fac-

tors and 1110 - therapy - exercise A 179

- NIDDM A 136 treatment - intensive [see also EASD -Study Group - AIDSPIT/

- - - diabetic nephropathy A 208 - - - haemorrheological effect A 259

hypoglycaemia, avoiding A18 islet B-cell function, effect on A51

# Insulinoma

- - - long-term A51

- - Type 2 diabetes A 25

Insulinoma – genetic abnormalities A77
– IVGTT findings A112

Insulitis /see also Lymphocyte /

protein expression during – BB rat vs allograft rejection A85

 subtotal pancreatectomy, induced by 1397

Interleukin – 1 – receptor – gene – Type 1 diabetes A72

- 1β - insulin secretion, effect on 779

 insulin-secreting cells or islets, effect on A82

--- protection against A80, A81

- - - copper, protection by 39

--- NOD mouse 153

 - - pure insulin-secreting cells and islets compared A117

- - - rat strain dependence A17

Intestine – GLP-1 secretion A170, A171 – glucose transport – vanadate, effect of – diabetic rat 403

Ion flux – islet B-cell [see B-cell, islet – Ca<sup>2+</sup>; B-cell, islet – K<sup>+</sup>]

Islet – acinar portal system 262

- amyloid polypeptide [see Amylin]

B-cell [see B-cell, islet; Insulin – secreting cell; Insulin – secretion]

Ca<sup>2+</sup> - oscillation - culture factors affecting 876c

- culture - Ca<sup>2+</sup> oscillation, effect on 876c

 FAD-glycerophosphate dehydrogenase – ontogeny A27

glucose metabolism – interleukin 1 β, effect of 39

- Kearns-Sayre syndrome, in 868

- mRNA - in-situ hybridisation 395

- nitric oxide, effect of A17

- NSY mouse 503

permeabilised – insulin secretion – GK rat 772

- reg gene expression 906

 regeneration – animal model – cellophane-wrapped pancreas 906

- insulin promoter factor A45

## K

K<sup>+</sup><sub>ATP</sub> channel – islet B-cell [see also B-cell, islet] 1025

Kearns-Sayre syndrome – islet function 868

Ketoacidosis, diabetic – alkali infusion, effect of 889

gastroparesis in – fatty acids, role of 632 c
 magnetic resonance spectrometry – <sup>31</sup>P

magnetic resonance spectrometry – <sup>31</sup>P 889

starved streptozotocin-diabetic rat 889
 vasodilatation in – prostaglandins, role

of A261 Kidney – diabetes – Albert Renold Fellowship 1995 *EASD News Section 10/* 

- hypertension and 254b

loop of Henle – Tamm-Horsfall glycoprotein 525

 single – microalbuminuria and – NIDDM A216

 Tamm-Horsfall glycoprotein – streptozotocin-diabetic rat 525 L

Lactate – infusion – glucose utilisation, effect on A12

- - hypoglycaemia, during A 203

 serum – exercise, effect of – diabetic rat 919

 postprandial rise – amylin, role of A 155

Lactic acidosis – diabetic ketoacidosis – alkali infusion effect 889

Laminin – P1 – diabetic retinopathy A 57 – serum – panretinal photocoagulation, ef-

fect of A 275 Laser Doppler flow measurement 129, 467, 555, 1337

Lens – glucose phosphorylation A 145 Leucocyte – motility A 259, A 260

Levosulpiride – gastroparesis treatment – hypoglycaemic effect A 245

Limited joint mobility – Type 1 diabetes – complications A 187
Lipase *[see also Lipolysis]* – hepatic – dia-

betes – Type 1 1419 Lipid-lowering agent [see also HMG CoA

reductase inhibitor/
- benfluorex - NIDDM, use in A 197

- diabetic nephropathy progression, effect on 604

Lipids [see also Apolipoprotein; Cholesterol; Dyslipidaemia; Hypercholesterolaemia; Hypertriglyceridaemia; Lipoprotein; Triglyceride]

- serum - NIDDM A247-A250

obesity – childhood 739

Lipoatrophic diabetes – liver transplantation, effect of A 140

Lipoatrophy – insulin-induced – TNF-a, role of A187

Lipodystrophy – abdominal obesity, with – metabolic studies A 156

Lipoic acid [see Thioctic acid] Lipolysis – diabetes – Type 1 1419

- diurnal rhythm - Type 1 diabetes A 151

enzyme profile – insulin resistance syndrome, in 344

- gestational diabetes, in A280

- hypertension, in A 163

 inhibitor - GR 79236 - gastric motility in DKA, effect on 632c

 insulin, effect of – glycerol clamp method A149

 subcutaneous glycerol release – obesity A 159

Lipoprotein [see also Apolipoprotein; Cholesterol; Dyslipidaemia; Hypercholesterolaemia; Hypertriglyceridaemia; Triglyceride]

- (a) - diabetes A250, A251

 – glycaemic control and – Type 1 diabetes A 26

– macrovascular disease and – diabetes
 711

serum – families of Type 2 diabetic patients 1434

 HDL – serum – LDL subclasses and 1328

 HMG CoA reductase inhibitor, effect of – diabetic nephropathy 604

insulin resistance syndrome 344

LDL – apolipoprotein (a) binding [see Lipoprotein – (a)]

- composition - diabetes in 1300

- - serum triglycerides, effect of A 249

 – glycaemic control and – Type 1 diabetes A 26

- glycation 1300, A 26

- hexose release, effect on A 162

- - insulinaemia and A248

- oxidation - diabetes, increased in 1300

- - fatty-acid composition and 1300
 - serum - proinsulin-like molecules and 1110

 sialic acid concentration – diabetic nephropathy A247
 size – insulin resistance syndrome in

- - size - insulin resistance syndrome, in 1328

- - subclasses 1328

- peroxidation - magnesium and A246

 serum – adverse profile predicted by childhood hyperinsulinaemia 1042

 - albumin excretion rate and - Type 2 diabetes A215

- - exercise, effect of - NIDDM 1313

Type 2 diabetes – insulin, effects of A 248
 VLDL – apolipoprotein B turnover – in-

sulin action A 247

- apolipoprotein B-100 959

- - subfractions - IDDM 1419

Liver – insulin resistance and A 153 Lundbaek, Knud – obituary EASD News

Section 9/95, 35
Lupus anticoagulant [see Antibody – phospholipid]

Lymphocyte – activated – detection in islets in vivo A 38

- antioxidant activity - Type 1 diabetes A 252

- B - EBV-transformed 62

- CD23 expression - Type 1 diabetes

 - subsets – auto-antibody production in Type 1 diabetes 62

CD95 expression – Type 1 diabetes 1449

subpopulations – pregnancy A70
 T – adoptive transfer of diabetes – BB rat 145

- bcl-2 expression - Type 1 diabetes 953

CD95 – Type 1 diabetes, expression reduced in A37

- CDR3 sequence - Type 1 diabetes A 38
- GAD reactivity - Type 1 diabetes A 38
- insulin-specific - Type 1 diabetes A 80

insulin-specific – Type 1 diabetes A 80
 insulitis, role in following subtotal pancreatectomy 1397

Lysine [see Glycation – inhibitor]
Lysosome – alloxan toxicity, role in 635

- enzyme - α-glucosidehydrolase - insulin secretion, role in A 108

### м

Macaca mulatta (rhesus monkey) – glycogen synthase A 156

Macrophage – lipoprotein (a), effect of A 251

Macrovascular disease A19, A52, A266–A270

angiotensin converting enzyme polymorphism and A227, A228
 angiotensin-II receptor polymorphism

A 228, A 229

- glucose tolerance and - Hoorn study 86

- impaired glucose tolerance, in 585
- insulin resistance, in oxidative stress, role of 1484c
- stroke [see Stroke]
- ultrasonography 585
- WHO MONICA project 1061
- Magnesium deficiency insulin receptor tyrosine kinase effect 1262
- hypertension, in A226
- lipid peroxidation and A 246
- metabolism Type 1 diabetes A 150
- NIDDM, in A226
- serum albumin excretion rate and -IDDM 629c
- Magnetic resonance imaging nerve -
- diabetic neuropathy A 231

   spectrometry, <sup>31</sup>P diabetic ketoacido-
- sis 889
- muscle glycolysis 1205
- stimulation central motor pathways
- Major histocompatibility complex [see HLA: MHC/
- Malaria hypoglycaemia animal model
- Malnutrition-related diabetes mellitus ketosis resistance A13
- MAP [see Mitogen-activated protein]
- Mass spectrometry islet ganglioside 1117
- protein matrix-assisted laser desorption ionisation 1069
- Maternally-inherited diabetes with deafness 193, A75, A78
- macular retinal dystrophy in A77
- MELAS, relationship with 1487c
- treatment coenzyme Q10 & L-carnitine? 1484c
- Mathematical model glucose tolerance tests A 125-A 128
- Maturity-onset diabetes in youth [see MODY/
- Meal standard mixed reactive hypoglycaemia assessment 494
- MELAS (Mitochondrial myopathy, encephalopathy, lactic acidosis and stroke-like episodes) [see also Kearns-Sayre syndrome/
- cerebral perfusion 1004c
- features in NIDDM in Japan 193
- mitochondrial mutation 1487 c
- Mesangial cell [see Glomerular]
- Metformin A197, A198
- UK Prospective Diabetes Study A 24 Methyl pyruvate - insulin secretion, effect
- on A 102 Mevalonic acid – gas chromatography mass spectrometry 959
- MHC (major histocompatibility complex) [see also HLA]
- Class I islet B-cell expression BB rat
- glucose transport, role in A 133
- MIBG (metaiodobenzoylguanidine) 123I [see Scintigraphy] 1345
- Microalbuminuria A210-A212
- carotid artery disease and A 269diabetes, Type 2 356
- monounsaturated fat diet, effects of 1069
- vascular mortality and 610
- glomerular epithelial foot processes in diabetes 1197

- hyperproreninaemia preceding IDDM A 62
- hypomagnesaemia and IDDM 629c
- insulin resistance and A221-A224 relatives of NIDDM subjects 363
- juxtaglomerular arterioles IDDM 1320 LDL sialic acid concentration and A 247
- NIDDM, in fibroblast glucose uptake & Ca2+ A141
- lipoprotein (a) and A251
- progression risk factors A215, A216
- Type 2 diabetes A 63
- risk factors for Type 2 diabetes A63
- vascular autoregulation A 263
- Microdialysis sc glucose sensing A 183 Minkowski - Lecture 1993 - insulin resistance in NIDDM 1378r
- Prize & Lecture 1995 John Todd EASD News Section 10/95 39
- Mitochondrial, mitochondrion [see also Gene - mitochondrial/
- ATP production bioluminometric method - islet B-cell A 144
- metabolism [see also Pyruvate dehydro-
- embropathy and diabetic pregnancy A21
- myocardial streptozotocin-diabetic rat 413
- myopathy, encephalopathy, lactic acidosis and stroke [see MELAS]
- respiration polarography islet B-cell A 95
- Mitogen-activated protein kinase adipocyte 1148
- glycogen synthesis, role in A 125
- MODY (Maturity-onset diabetes in youth)
- family study A34, A60
- chromosome 12 A 74 linkage studies 1055
- prevalence central Europe 1482c Molecular mimicry - GAD and α2-macro-
- glolulin 874c
- MONICA (Multinational Monitoring of Trends and Determinants in Cardiovasc. Dis.) 1061
- Monkey rhesus [see Macaca mulatta] Morphometry – glomerulus – basement membrane 1169
- SHR/N-cp rat 31
- islet NSY mouse 503
- Mortality cardiovascular diabetes Type 2 610
- body mass index, effect of A 59
- Italy 318
- stroke 1061
- - Type 2 glycaemic control and 672
- microalbuminuria and 610
- diabetic nephropathy Japan vs Pennsylvania, USA 236
- Pima Indians A 63
- smoking, effect of A 209
- diabetic retinopathy A278
- stroke, diabetes and 1061
- Mouse db/db fatty acids and islet B-cell function A93
- New Zealand Obese Type 2 diabetes model 1389
- NOD islet B-cell injury interleukin 1β vs nitric oxide 153
- nicotinamide treatment A 97
- - reg gene expression A74

- NSY (Nagoya-Shibata-Yasuda) Type 2 diabetes model 503
- nude human islet transplant amyloid
- transgenic aldose reductase 255
- glucocorticoid receptor overexpressing, islet B-cell A 128
- GLUT-4 overexpressing A11, A15
- preproinsulin-expressing pituitary cell A 55
- superoxide dismutase embyropathy, diabetic A21
- Muscle skeletal [see also Glucose transport: GLUT/
- <sup>31</sup>P magnetic resonance spectroscopy 1205
- blood flow insulin, effect of 555, A50
- - diabetes, Type 2 3r
- eccentric exercise insulin sensitivity, effect on A179
- GLP-1 (7-36 amide), effect of A39
- glucose metabolism Type 2 diabetes 326
- glucose transport NIDDM A 151 glucose uptake - blood flow, effect of
- glutamine:fructose-6-phosphate amidotransferase A152
- glycogen synthase sulphonnylurea
- therapy 1230 glycogenesis - GLP-1 (7-36 amide), no effect of 864
- glycogenolysis insulin resistance, de-
- laved in A67 glycolysis - low birth-weight adults, in
- 1205 insulin, effect of - training & ageing ef-
- fects A11 insulin receptor tyrosine kinase activ-
- ity 55 insulin resistance - Otsuka Long-Evans
- Tokushima Fatty Rat 1033 interstitial insulin concentration
- oxygenation Type 1 diabetes A 253
- phosphotyrosine phosphatase hyperinsulinaemia, effect of A11
- plasma membrane exercise & ageing,
- effects of A179 sensory denervation - insulin sensitivity following A 138
- smooth growth insulin, effect of streptozotocin-diabetic rat A 147
- vascular [see also Vascular reactivity]
- cyclic nucleotides in 936
- proliferation A53 Myo-inositol - therapy - renal effects - diabetic rat 899
- Myocardial infarction [see Heart myocardial infarction/

- Nephropathy diabetic A 62, A 208-A 214
- angiotensin converting enzyme inhibition A218-A221
- biochemical mechanisms rat 387
- - collagen expression 632c EASD Study Group EASD News Sec-
- tion 9/95, 35 w glomerular basement membrane 1455

## Nerve

glomerular epithelial foot processes 1197

glycaemic control and - islet transplantation in rat 1007

hyperfiltration - streptozotocin-diabetic rat 536

juxtaglomerular arterioles in 1320

NIDDM A215-A218 nocturnal hypertension 216

octreotide, effect of - rat 135 pregnancy in 227

procoagulant activity in 73

- - prognosis A46 progression - ACE inhibitor - betablocker as good? 123c

- lipid-lowering therapy, effect of

myo-inositol therapy, effect of 899

- - SHR/N-cp rat 31

- susceptibility - diabetic retinopathy and 599

- experimental studies A 206-A 208

galactose-fed rat - polyol pathway 46 Nerve - acetyl carnitine, effect of - diabetic rat 872c, A7, A8

cilostazol, effect of - streptozotocindiabetic rat 914

- - laser Doppler 129

– streptozotocin-diabetic rat 1285

- conduction study - reporducibility A 235

- diabetes - anti-oxidant treatment 129

- function - diabetes - childhood 685

IGF-I, effect of A8

Na+/K+ ATPase - cilostazol, effect of diabetic rat 914

reductive stress - diabetic rat A8

- regeneration in diabetic neuropathy - aldose reductase inhibitor A 233 Nesidioblastosis, neonatal A15

Neuropathy - autonomic diabetic A 237-

A 241 - 123I-MIBG scintigraphy - heart 1345

diurnal variation in BP & AER A213 exercise, response to 244, 1003 c

gastroparesis A32

hypoglycaemia response A 203 diabetic - anti-oxidant treatment 129

- - central motor pathways in 1191

childhood - glycaemic control 685

cilostazol therapy 914 clinical studies A235-A238 experimental studies A 230-A 234

haemorrheological factors 872c

- - motor evoked potentials A7

- - oxidative stress, role of - streptozotocin-diabetic rat 1285

- - painful - spinal cord stimulator A7

peripheral vascular disease, role of 1051

- - pregnancy, in A 285

- - treatment - lipoic acid 1425 visual evoked potentials 573

Neuropeptide Y - intracerebral - hyperphagia 998r

islet – glucocorticoid, expression induced by A147

Neurotrophin - 3 - insulin-secreting cell, effect on A 106

Neutrophil, polymorphonuclear - oxidant production in NIDDM A 252

Nicotinamide [see Diabetes - Type 1 - disease-modifying therapy; Transplantation

NIDDM (Non-insulin-dependent diabetes mellitus) [see Diabetes - Type 2]

Nifedipine [see Calcium - channel - blocking agent/ Nitric oxide - endothelium-dependent -

diabetes A 265 - - glucose, effect of A48

L-arginine, effect of in Type 1 diabetes A48

insulin secretion, role in A 109

islet, effect on - DNA damage A17

synthase - insulin-secreting cell A82 NOD mouse islet 153

NSY mouse [see Mouse] Nutrition [see also Diet]

Obesity [see also Fat - distribution; Insulin resistance - syndrome/ A 158-A 160, A 164

abdominal - exercise, effect of in NIDDM 1313

- hypertriglyceridaemia and 1358

animal model 998r

childhood - glucose turnover 739

fat distribution A 58

glucose turnover - childhood 739

hyperinsulinaemia – β-endorphin, role of A112

metabolism in A58, A59

Obituary - Knud Lundbaek EASD News Section 9/95, 35

Octreotide - diabetic nephropathy, effect on - rat 135

kidney, effect on A 206

Oculomotor function - diabetes A 236 Oestrogen - replacement - NIDDM A 25 Okadaic acid [see also Phosphorylation -

serine-threonine/ insulin secretion, inhibition of A118

Olive oil [see Diet - fat - monounsaturated] Oscillation - insulin secretion - assessment in vivo A127

- basal A104

- - cAMP, effect of A 104

insulin resistance and A148

phosphofructokinase, role of A16 - islet B-cell - cytosolic Ca<sup>2+</sup> A 121

- ATP/ADP ratio A 109

- - - tetraethylammonium, effect of A 94

- - K<sup>+</sup><sub>ATP</sub> channels A 123

Osteonectin - expression - renal hypertrophy, reduced in A62

Ouabain-like immunoreactivity 792 Oxidation - LDL 1300

Oxidative stress - alloxan-induced - insulinsecreting cell 635

coronary vascular reactivity, effect on 1157

diabetes A40, A252, A253

diabetic embryopathy, role in A21, A 281

diabetic microangiopathy, role in - streptozotocin-diabetic rat 1285

diabetic nephropathy, role in - rat 387

diabetic neuropathy, role in - streptozotocin-diabetic rat 1285

- endothelial cell mitochondrial gene deletion induction A 261

insulin-secreting cell injury A 253

- macrovascular disease, role in - insulin resistance and 1484c

nerve, effect on A 232

- retina - diabetes A 276

scavenging - diabetes, reduced in 201 Oxoaldehyde DH - 3-deoxyglucose scavenging, role in? A 161

Oxotremorine-M - islet B-cell, effect on A118

PACAP (Pituitary adenylate cyclase activating peptide)

receptor - gene - MODY and 1055

insulin secretion, stimulation of - intra-

cellular signalling A 125
Pancreas – biopsy – Type 1 diabetes – viral
DNA studies 667

duct cell - differentiation to islet B-cell 1405

- exocrine - islet hormones, effect of 262

- neural activity - conscious dog A 155 venous diversion - insulin sensitivity, ef-

fect on A137

Pancreatectomy - subtotal - islet autoimmunity induction 1397

Pancreatic polypeptide - diabetic autonomic neuropathy, in A32

Pancreatitis - tropical calcific - glucose homeostasis A139

Perlecan gene A 229

pH - intracellular - islet B-cell A 119 Phosphatidyl-inositol 3'-kinase - hypertensive hypertriglyceridaemic rat A 137

inhibitor - wortmannin 1148 Phosphodiesterase inhibitor - cilostazol -

diabetic nerve, effects on 914 Phosphofructokinase - insulin secretion,

role in A16 intestine - vanadate, effect of 403 Phospholipase C - activation - GTP, role of in islets A117

Phospholipid - fatty acid composition -NIDDM A139

Phosphorylation - serine-threonine - insulin action, in - adipocyte A 122

Phosphotyrosine phosphate [see Muscle] Photolabel - glucose transport - ATB-**BMPA** 661

Pima Indians - risk factors for NIDDM 187

Pituitary - adenylate cyclase activating peptide [see PACAP]

Placenta - diabetes A280, A281

Plasminogen [see Fibrinolysis; Haemostasis] activator - inhibitor - hyperinsulinaemia, effect of - Pima Indians A 139

Platelet - leucocyte co-aggregation - diabetic neuropathy, role in A230

membrane antigens - diabetes A 162 Polymorphism - HLA-DM A73

insulin receptor substrate-1 gene 481 RADI - Type 2 diabetes not associated

A75 - TAP2 A72

Polyol pathway - kidney - galactose-fed

Portal hypertension - glucagon and insulin levels in A 129

Prediabetes - Type 1 - CMV infection 705

GAD antibody A43

- in utero? A 90
- insulin therapy [see also Diabetes - Type 1 - disease-modifying therapy/ A 99

insulitis detection in vivo A38 - - islet-cell antibodies - 37kD 370

islet-cell associated autoimmunity A88

- markers A42

- Type 2 - non-esterified fatty acids, serum 1213

proinsulin & specific insulin, serum

Prediction - BB rat diabetes - soluble L-selectin A81

- hypertension - childhood hyperinsulinaemia 1042

insulin requirement in Type 2 diabetes A25

- families A6

general population A54

islet-cell antibodies - 37kD 370

- strategy 816

islet-cell associated autoimmunity A 89

- Type 2 diabetes A187, A188, A60, A61

non-esterified fatty acids 1213

Pregnancy A 280

Coxsackie B infection - Type 1 diabetes risk in child 1371

- diabetes A36

- - embryopathy - White class and A21

- immunology A70- nephropathy, effect of 227

oral hypoglycaemic agent - glyburide? 753

- normal - glucose tolerance A71

- HbA<sub>1c</sub> - pregnancy outcome and A36 insulin-like molecules - outcome and

A37

islet blood flow - rat A 94

- protein malnutrition during - insulin resistance in offspring - rat A 142

- protein malnutrition, following - fetal glucose utilisation A36

President, message from EASD News Section 1/95

Programmed cell death [see Apoptosis] Proinsulin - assay - enzyme amplification A 156

conversion – assessment in vivo A 114

-- NIDDM A114

- convertase - PC<sub>2</sub> - sorting to granules A 105

insulin ratio 1176

- LDL subclasses and 1328

like molecules - serum cardiovascular risk factors and 1110

serum - prediabetes - Type 2 1176 split - vitamin D deficiency and 1239

Type 2 diabetes, levels in - treatment mode and A136

Prolactin - signal processing - insulin-secreting cell A118

Prostaglandin E<sub>2</sub> – glomerular hyaluronan production, effect on 298

mesangial cell, effect on A 207

Protamine - vascular proliferation stimulated by A 254

Protein - body - diabetes, loss in - islet transplantation, effect of 881

G [see G protein]

heat shock [see Heat shock protein]

kinase - C - activator - PMA - rat adipocyte, effect on A141

inhibitor - insulin secretion, effect on A16

insulin action, role in A 122

 – – insulin secretion, role in A 123 isoforms - endothelial cell A 255

- - II - calcium/calmodulin dependent insulin-secreting cell A 120

 metabolism - regulation A22, A23 molecular weight - matrix-assisted laser

desorption ionisation 1069 phosphatase - 1 - β - gene - insulin resis-

tance not linked 461 Tamm-Horsfall - streptozotocin-diabetic

rat kidney 525 Psychology – well-being [see also Quality of life] – diabetes and A180–A182, A186

Psychosocial aspects of diabetes - EASD study group EASD News Section 7/95

Puberty - glucose homeostasis A113 Publication redundancy and standards Edi-

torial 1375 Pulsatility [see Oscillation]

Pyruvate - dehydrogenase [see also Insulin - secretion/

E1 a catalytic subunit - phosphorylation monitoring A144

impaired glucose tolerance, marker of A33

- kinase - islet 125 c

- carboxylase - hepatic - diabetic NZO mouse 1389

Quality of life - diabetes and A 180-A 182

# R

Radiographic contrast medium - renal function, effect on in DM A213

Rat - BB - blood pressure A 226

- - diabetes - adoptive transfer 145 gastric emptying - amylin, effect of

642 --- genetics A73

--- immunotherapy A98

non-specific immune stimulation

145

prevention 1138

- diet, effect of - islet B-cell MHC Class I expression 1138

MHC expression, islet A82

spontaneously hypertensive rat, hybrid with A79

- Cohen diabetic - myo-inositol feeding

- Dahl salt-sensitive - nephropathy A 208

galactosaemic - cataract A 276

galactose-fed - aldose reductase expression in kidney 46

GK Wistar - insulin secretion - L-leucine, effect of A 103

Goto-Kazikaki (GK)

- - ageing A137

- - genetics A79

glucose-6-phosphatase activity, islet A 143

- insulin secretion 772, A 146

- hereditary hypertriglyceridaemic - genetics A 225

- ω-3 fatty acid, effect of A146

insulin sensitivity - insulin species 1492 c OLETF - sex hormones, effect of A147

Otsuka Long-Evans Tokushima Fatty -Type 2 diabetes model 1033

sand – cataract A 276 SHR/N-cp [see Rat – spontaneously hypertensive - NIH-corpulent/

spontaneously hypertensive - ACE inhibitor, effect on A 140

- BB rat, hybrid with A79

NIH-corpulent - Type 2 diabetes model 31

streptozotocin-diabetic - body composition 881

diabetic nephropathy 387

glomerular basement membrane 1169

glucose production increased 283

glucose turnover A 154 insulin sensitivity 283

nicotinamide-protected A 103

ventromedial hypothalamic lesion - obesity model 998r

WBN/Kob - diabetic - hearing impair-

ment associated 649 Zucker – fa/fa – diet, effect of on islet B-cell GLUT2 173

metabolic studies 998r

insulin resistance A 138

Reductive stress - retina - diabetes A 276 Renal - artery stenosis A 268

biopsy - diabetic nephropathy A217

Type 1 diabetes - glomerular volume

 disease, non-diabetic – diabetes, in A217 mitochondrial gene mutation A 229

failure - chronic - insulin resistance 565 hypertrophy, diabetes - insulin, effect of

octreotide, effect of 135

osteonectin (SPARC) and A62

tubular function – NIDDM A 218

Renin - plasma activity - diabetes 1443 Renin-angiotensin system – glycaemic control and - IDDM A214

Respiratory function - Type 1 diabetes A 187

Retina - advanced glycation end-products, toxicity of A161, A162

basement membrane - streptozotocindiabetic rat 269

endothelial cell - replication A 145 glucose phosphorylation A 145

hypotensive drugs, effects of A 58 photography – 45-degree 437 photostress 804

Retinopathy - diabetic A 275-A 279

albumin excretion rate and - EURO-DIAB Study 599

aminoguanidine, effect of - diabetic rat 656

early changes - aminoguanidine, unaffected by 269

grading – retinal photography 437 growth factors A57

incidence A57

# Rhesus monkey

islet transplantation, effect of - diabetic rat 656

progression - UK prospective diabetes study A58

screening - retinal photography 437 streptozotocin-diabetic rat 269, 656

Rhesus monkey [see Macaca mulatta] Rheumatoid arthritis - islet-cell antibodies in 351

Risk - diabetes - Type 1 - recurrence in children 975

Type 2 - parental diabetic nephropathy 1486c

- parental diabetic nephropathy 221 - macrovascular disease [see Cardiovascular - risk factor/

# S

Scintigraphy - 123I-MIBG 1345

99 mTc-methoxyisobutylisonitrile 1345

- thallium - screening for coronary heart disease 726

Screening - diabetic neuropathy A 235, A 236

diabetic retinopathy - primary care A 278

retinal photography 437 Selectin [see Adhesion molecule]

Selenium compounds - glucose transport, stimulation of A133

Sex hormone binding globulin - gestational diabetes and A 284

Shock - hypovolaemic - alkali infusion in

Sialic acid, serum - diabetic nephropathy A 217

lipid-associated A270

Skin - blood flow - diabetes 467 Sleep - glucose homeostasis and A 148 Smoking - hypertriglyceridaemia, role in

- mortality in haemodialysis for diabetic nephropathy, effect on A 209

serum insulin, effect on - two-site immu-

nometric assay A 223 Sodium transport – Na<sup>+</sup>/H<sup>+</sup> – diabetic cardiomyopathy and A266

endothelial cell - glucose, effect of 785 families of Type 1 diabetics A 230

- Na+/K+ ATPase - inhibitor - insulin resistance, effect in 792

- - myo-inositol feeding, effect of 899 renal tubule A64

Na<sup>+</sup>/Li<sup>+</sup> counterport – albumin excretion

rate and 356

cardiovascular risk factor and -NIDDM A229

- - insulin resistance and A224 - left ventricular mass and 454

Somatostatin - insulin secretion, effect on A 124

 pancreatic acinar cells, binding to 262 - receptor - Type 5 - islet B-cell A 106

Sorbitol - dehydrogenase - inhibitor - diabetic neuropathy, effect on A232

SPARC (secreted protein acidic and rich in cysteine) [see Osteonectin] SPECT (single-photon emission CT) [see

Brain - perfusion/ Spodoptera frugiperda - cell - transfection human GAD65 14

Sports [see Exercise]

Statin [see HMG CoA reductase inhibitor] A 258

Stereology - glomerular /see Glomerular morphometry; Heart - cardiomyopathy/ Steroid [see Glucocorticoid]

Streptozotocin - diabetes - low-dose -GLUT2 role A 134

Stress - life events - glucose tolerance and A61

- protein [see Heat shock protein]

sympatho-adrenal response - hyperglycaemia, effect of A147 Stroke A270

diabetes 1061

diabetic autonomic neuropathy, increased risk in A 240

epidemiology - Sweden 1061 Sulphatide - islet, synthesis in A 45 Sulphonylurea A196, A197

cardiovascular effects 116r glibenclamide 1025

glyburide - placental handling - rat 753

insulin secretion, effect on A 107

K+ATP channel, effect on 1025, A 43 proinsulin levels, effect on A115

receptor - gene - Type 2 diabetes linkage studies negative 1479

insulin-secreting cell 277

- - troglitazone, effect of 24

therapy - glycogen synthase expression, no effect on 1230

lipolysis, effects on A247

UK Prospective Diabetes Study A24 Suramin - neuropathy A 234

Synaptic vesicle docking - syntaxin - islet Bcell, present in 860 Syndrome X - metabolic [see Insulin - re-

sistance - syndrome/ Syntaxin 1 - islet B-cell, role in A 123

# T

Tamm-Horsfall protein /see Protein -Tamm-Horsfall/

Taste sensation - diabetes A 186 Taurine - insulin secretion, effect on A 104 Temperature - insulin secretion, effect on A 124

Thapsigargin - insulin secretion, effect on A 109

Thiazide - low-dose 853

Thiazolidinediones [see Hypoglycaemic agent - thiazolidinediones/

Thioctic acid (lipoic acid) - cataract protection A277

diabetic neuropathy, effect on - streptozotocin diabetes A231

glucose oxidation, effect on - obese NIDDM A41

glucose transport, effect on A132, A133 skeletal muscle, effect on - Zucker rat

- therapy - diabetes, Type 2 A 199 diabetic neuropathy 1425

Thyroid [see also Hyperthyroidism] autoimmune disease in Type 1 diabetic families A 90

function - elderly NIDDM, in A 185

glucose transport, effect on - rat adipocyte A135

TNFa [see Tumour necrosis factor a] Tocopherol [see Vitamin E]

Transfection - human proinsulin gene retroviral vector A84

insulin receptor gene - Chinese hamster ovary cells 180

Transplantation - bone marrow - hyperinsulinaemia A14

heart - glucose tolerance - islet amyloid and A14

insulin-secreting cell - transgenic A 55 - islet [see also EASD - Study Group -AIDSPIT/ A83

- - adrenergic responsiveness A85

- - amino-acid metabolism following A 23

body composition, effect on 881

- - diabetic nephropathy prevention A 208 - - diabetic retinopathy, effect on - diabet-

ic rat 656 energy metabolism, effect on in diabetic rat 919

function A55

- - glucotoxicity A85

immunoalteration A56

- - immunoisolation A84

- - interleukin-10 transfection A 56

- - intraportal A56

- long-term evaluation in rat 1007

- - microencapsulation A56

- - nicotinamide protection A 56

- - xenograft - human to nude mouse

- kidney - diabetes following A14

- liver - lipoatrophic diabetes A 140

- - non-esterified fatty acid metabolism A14

- pancreas A83

hypoglycaemia following A19

Transporter - antigen processing - gene in Type 1 diabetes A 72

Triglyceride - subcutaneous monitoring for hypoglycaemia A 202

Trigonella foenum graecum (Fenugreek) A 101

Triphenyltin - insulin secretion, inhibition of A118

Troglitazone [see Hypoglycaemic agent thiazolidinedione/

Tumour necrosis factor α - adipocyte, effect on 764

- cachexia, role in? 764

insulin receptor, effect on A 136

Type 2 diabetes - coronary disease A19 Tungsten [see Hypoglycaemic agent - vanadate/ A143

Tyrosine kinase [see also Insulin - receptor] C - islet B-cell - neurotrophin-3 recep-

tor A 106 - focal adhesion kinase - phosphorylation

islet B-cell cytoplasmic – Bsk A 94

phosphoinositol metabolism, role in - islets A117

# U

Ulcer - foot [see Foot] Ultrasonography - B mode 585

Doppler 555

echo tracking - arterial compliance 1082 Urinary bladder [see Bladder]

- Urine albumin excretion rate Isee Albumin - excretion rate/
- IgA diabetic nephropathy progression and A210

### V

- Vanadate [see Hypoglycaemic agent vanadate/
- Vascular compliance A 268
- disease [see also Heart]; Macrovascular disease; Microangiopathy/
- - peripheral treatment diabetic neuropathy, effect on 1051
- Type 2 diabetes UK Prospective Dia-
- betes Study A 19 proliferation diabetes A 254, A 255
- reactivity coronary 1157- diabetes A261-A265
- aldose reductase inhibitor, effect of A 255
- Type 2 1337
- diabetic neuropathy, in A 230

- - insulin, effect of cAMP and cGMP involved 936
- normal human 467
- Vasoactive intestinal polypeptide [see VIP] Vasodilatation - insulin-induced A 157 VIP (Vasoactive intestinal polypeptide)
- diabetic autonomic neuropathy A 239 insulin secretion, effect on A 101
- Virus baculo- transfection, use in 14
- Coxsackie B pregnancy Type 1 diabetes risk in child 1371
- cytomegalo Type 1 diabetes 667, 705
- EMC diabetes induction in mice insulin prophylaxis A97
- entero islet B-cell injury A16
- Epstein-Barr islet-cell antibody seroconversion and 1130c
- Type 1 diabetes 667
- pancreas Type 1 diabetes pancreas biopsy at diagnosis 667

  – Type 2 diabetes A79
- Vision evoked potentials diabetes 573
- flash electroretinography early IDDM
- macular function early IDDM 804

- Vitamin C [see Antioxidant]
- D deficiency glucose homeostasis in 1239, A113
- E [see also Antioxidant]
- coronary vascular reactivity, effect on diabetic rat 1157
- diabetic embryopathy, effect on A22
- - diabetic nerve, effect on 129
- insulin resistance syndrome, effects in A 166
- oxidative stress, effect on insulin resistant rat A41
- Type 1 diabetes disease-modifying therapy A99
- vascular reactivity, effect on diabetic rat 1475

- War incidence of Type 1 diabetes 550 WHO (World Health Organisation) -MONICA Project 1061
- Wortmannin [see Phosphatidyl-inositol 3'kinase - inhibitor/



